

CONTENTS.

INTRODUCTION.

SECTION I.

	PAGE.
General Description and Physical Configuration of the Country ...	1

SECTION II.—GEOLOGY AND MOUNTAIN SYSTEM.

Part I.—Sketch of the Geology of Rájputáná ...	8
„ II.—Mountains and Hill Ranges ...	10
„ III.—The useful Minerals of Rájputáná ...	13

SECTION III.

Climate and Hygiene ...	19
-------------------------	----

SECTION IV.—FORESTS.

Part I.—Forest Topography, ...	22
„ II.—Forest Flora ...	24

SECTION V.

Part I.—Rivers and Water Storage ...	32
„ II.—Lakes ...	35

SECTION VI.

History ...	37
-------------	----

SECTION VII.

Part I.—Political Institutions and State of Society ...	54
„ II.—Population ...	65
„ III.—Statistics of Population ...	81
„ IV.—Towns and Fortresses ...	85

SECTION VIII.

Religion ...	89
--------------	----

SECTION IX.

Industrial Occupations ...	91
----------------------------	----

SECTION X.

Land Tenures ...	92
------------------	----

SECTION XI.

Agriculture and Soils ...	96
---------------------------	----

BANSWARA.

	PAGE.
General Topography	101
Forests	102
Mineral Productions	<i>ib.</i>
Rivers and Lakes	103
Climate and Rainfall	<i>ib.</i>
History	104
Dominant Classes	106
Official Classes	108
Agriculture	109
General R��venues	110
Land Tenures	114
Population; Castes, Clans and Tribes	116
Social Customs	117
Administration	122
Communications; Districts, Principal Towns, and Remarkable Places	123
Fairs	126

APPENDIX,

(State of Kusalgarh.)

Natural Features	126
Climate and Rainfall	127
History	<i>ib.</i>
Dominant Classes	128
Agriculture, Land Revenue, and Land Tenures	<i>ib.</i>
Population; Castes, Clans and Tribes	129
Administration, &c.	<i>ib.</i>
Communications; Districts, Towns, and Villages	<i>ib.</i>
Fairs	130

BHARTPUR.

General Topography	131
Geology, Hill Ranges, and Minerals... ..	132
Climate and Rainfall	136
Rivers	140
History	141
Form of Government	147
Aristocracy and Official Classes	148
Agriculture, Land Revenue and Tenures, Proprietary and Cultivating Classes	149
Population; Castes, Tribes, and State of Society	157
Commerce and Trade	164

Administration, &c.	...	...	...	...	...	170
Communications	...	...	...	...	...	175
Principal Towns, Fairs, and Remarkable Places...	...	...	...	...	...	178

BIKANIR.

General Topography	...	...	...	...	...	179
Minerals, Climate, and Rainfall	...	...	...	...	...	180
Rivers, Lakes, and Wells	...	...	...	...	...	181
History	...	...	...	...	...	182
Form of Government, and Dominant Classes	...	...	...	...	...	184
Agriculture	...	...	...	...	...	185
Land Revenue	...	...	...	...	...	187
Land Tenures	...	...	...	...	...	189
Commerce	...	...	...	...	...	191
Population and Social Sub-divisions	...	...	...	...	...	193
Religion and State of Society	...	...	...	...	...	195
Administration	...	...	...	...	...	197
Communications	...	...	...	...	...	198
Principal Towns	...	...	...	...	...	199
Fairs, and Remarkable Places	...	...	...	...	...	201

BUNDI.

General Topography	...	...	...	...	...	203
Geology	...	...	...	...	...	205
Rivers	...	...	...	...	...	210
Lakes and Tanks	...	...	...	...	...	215
History	...	...	...	...	...	218
Population, &c.	...	...	...	...	...	221
Religion	...	...	...	...	...	224
Administration, &c.	...	...	...	...	...	ib.
Agriculture	...	...	...	...	...	227
Communications	...	...	...	...	...	234
Towns and Remarkable Places	...	...	...	...	...	235
Temples, and Holy-places	...	...	...	...	...	239
Archæology	...	...	...	...	...	240
	...	...	...	...	...	241

DHOLPUR.

General Topography	...	...	...	...	...	243
Geology	...	...	...	...	...	ib.
Rivers	...	...	...	...	...	245

	Page
Climate and Rainfall	216
History	<i>ib.</i>
Particulars regarding the ruling family	218
Administration and Form of Government	250
Dominant Classes	251
Agriculture	253
Land Revenue and Land Tenures	259
Population and Social Sub-divisions	262
Religion	<i>ib.</i>
Jails and Police	261
Communications ; Towns and Remarkable Places	265
Tabular Statements	269

DUNGARPUR.

General Topography	273
Geology and Minerals	274
Rivers and Lakes	<i>ib.</i>
Climate and Rainfall	<i>ib.</i>
History	275
Form of Government, and Administration	276
Agriculture	278
Land Revenue and Land Tenures	279
Population and Social Sub-divisions	281
Administration, &c.	283
Communications ; Towns and Remarkable Places	<i>ib.</i>

Let us first take the north-western division, which comprises the whole vast tract stretching, from Sinde on the west, northward along the southern Punjab frontier to near Delhi on the north-east. The character of this tract is throughout uniform; it is sandy, unproductive and ill-watered; improving gradually from a mere desert in the far west and north-west, between Rajputana and Sinde, to comparatively habitable and fertile lands toward the north-east. Keeping the Arvali range as our base line of observation, and looking from its south-west end at Aboo due west to the Runn of Kutch, we find that almost immediately beyond the mountain's skirt the soil alters from hard rock to sand mixed with very little loam. The country has many wide flats, but more commonly shows gentle undulations; while a good many isolated hills, occasionally of some height, are seen; and as far as the beginning of the desert proper there is a succession of gentle swells, clothed with rather thick low jungle. This tract is fairly peopled, and to some extent cultivated, though the inhabitants rely largely for subsistence on great herds of cattle, which feed on the grass that covers all this country after the rains. Beyond the Loni, and from the edges of the Runn of Kutch, stretches northward the great desert which divides Rajputana from Sinde along the whole of its western frontier. Eastward of this great desert comes a tract of rocky country much cut up by limestone ridges, which to some degree protect it from the desert sands; and upon this zone of less absolutely sterile country (within which lies the Malláni district) there is more cultivation and vegetation, though sand-hills and hard stiff clay occupy the greater part. The zone serves, however, to separate the great desert in the west from what has been called the little desert lying east of it, which runs up from the Loni between Jesulmer and Jodhpur into the northern wastes. In the southern half of Jesulmer, again, and in the south and east of Bikanir, there is a light, cultivable soil; but over the greater part of North-Western Marwar, and throughout northern Jesulmer, Bikanir, and the upper portion of the Shekhawati country belonging to Jaipur, extends a sandy plain, traversed in the interior by long waves of sand-hills: towards the extreme north-west the sand gives place to extensive flats of hard clay.

The character of the desert region is the same everywhere. It is covered by sand-hills, shaped generally in long, straight ridges, which seldom meet, but run in parallel lines, separated by short and fairly regular intervals, something like the ripple marks on a sea-shore upon a very magnified scale. Some of these ridges may be two miles long, varying from 50 to 100 feet in

height: their sides are water-marked, and at a distance they look like substantial low hills. Their summits are blown up and curved like waves by the action of the periodical westerly winds; they are sparsely clothed with stunted shrubs and tufts of coarse grass in the dry season, and the light rains cover them with vegetation. The villages within the deserts, though always known by a local name, cannot be reckoned as fixed habitations, for their permanence depends entirely on the supply of water in the wells, which is constantly failing or turning brackish; and so soon as the water gives out, the village must shift. A little water is collected in small tanks or pools, which are dry before the stress of the heat begins, and in places there are long marshes impregnated with salt. This is the character, with more or less variation, of the whole north and north-west of Rajputana. The cultivation is everywhere poor and precarious, though certain parts have a better soil than others, and some tracts are comparatively productive. Nevertheless the principal towns within this region are well built and fairly prosperous: they have for ages managed the traffic across these deserts, and their position has given them immunity from plunder by great predatory armies.

Along the base of the Arvali range, from Abōo north-east towards Ajmer, the submontane region lying immediately under the abrupt northern slopes and absorbing their drainage is well cultivated, where it is not covered by jungle, up to the Loni River. This river runs from Ajmer to the Runn of Kutch in a course roughly parallel with the Arvalis, which supply its water. The tract between the range and the river is at first dotted with conical rocky hills cropping up irregularly, and varying in height from 600 to 2,000 feet above their bases; there are also long spurs of the Arvalis striking out into the plain. Hereabout are many substantial villages, and a good breadth of permanent tillage, especially along the banks of the Loni. After the Loni is crossed north-west, the surface streams are mere rain gutters; the water in the wells sinks lower and lower, cultivation becomes more patchy and poorer, until the scanty loam shades off into the sandy waste. The whole of the north-western division of Rajputana may indeed be said to present much the same aspect, with a general level much lower than the country on the eastern side of the Arvalis, and radiating with a constant, though very slight, slope towards the Runn of Kutch and the Indus.

As the Arvalis approach Ajmer from the south-west, their continuous chain breaks up, and the spinal range is dislocated into separate hills and sets of hills. The backbone of the country is, however, marked by a line of highest elevation, which about this part forms one of the main watersheds of India, whence

the rivers flow south-west and south-east to the two seas. Here is the central midland country of Rajputana; the town of Ajmer stands among the disunited hills, upon the highest level of an open table-land spreading eastward towards Jaipur, and sloping by degrees to all points of the compass: northward the country is sandy as it leaves the hills; southward the soil improves; and the midland districts, comprising Kishengarh and the southern half of the Jaipur State, are fertile and well cultivated. From Ajmer the Arvalis trending north-eastward never re-unite into a chain, though their range-direction is very plainly denoted by successive hills and rocky eminences, which stretch past the Sámbar Lake north-eastward through the Jaipur country up to the group of hills near Khetri, which rise bold and abrupt from the plains. Their line, however, still serves to divide roughly the sandy country on the north and west from the kindlier soil on the south and east; though, as the range breaks up, its correspondence with any such division of characteristics becomes, of course, more and more indistinct. For whereas, from Aboo north-east to near Ajmer the unbroken range stands like a barricade, and effectively protects the country behind it from the influx of sand; beyond Ajmer, again, to the north-east, although the general elevation and run of the ridges have to some extent checked the spread of sand from the west, yet the sand has drifted through many openings and intervals among the hills, and has overlaid large tracts on the eastern side of the line. Against the hills that surround the city of Jaipur the sand lies piled up like a snow-drift on their western face. Nevertheless we may still say that the peculiar desert type of country only begins north-west of the Arvalis, whence as one goes farther towards that point of the compass the water sinks steadily deeper; while as the general slope of the land is in the same direction, it may be inferred that the beds of sand increase regularly in depth to the north-west. In the greater part of this country agriculture is difficult, yielding thin surface crops, dependent on the uncertain rains; the land gives one crop within the year; the wells are few and deep, and the towns and villages at long distances apart, built usually upon the beds of hard stone, which crop up occasionally. And though in the north-eastern angle of Rajputana the country is not so near a wilderness as on the extreme north and west, yet a great extent is comparatively waterless and waste. In this manner, along the whole of this north-western division of Rajputana, the Arvalis represent a coast line, partly fenced by high cliffs, and partly an irregular shore pierced by bays and inlets, against which the sea of sand flows up continually from the shelving plains of the west. Close along

this coast the sand has hardly overflowed the firm soil ; further out in the plains it is still shallow, with rocks showing above the level, with outlying strips of tilled soil and hospitable oases ; while farther away in the distance the open sea of sand is deep and almost unbroken, rolling up in long waves driven forward by the strong westerly winds of the hot season.

Our second great division, Rajputana south-east of the Arvalis, contains the higher and more fertile countries that stretch inland, as it might be said, behind the coast line, which we have supposed the range fronting north-west to represent. This division may be circumscribed by a line starting from the south-western extremity of the Arvalis, and sweeping round first south-eastward, then eastward along the northern frontiers of Guzerat and Malwa. Where it meets the Gwalior territory, the Rajputana border line turns northward, and eventually runs along the Chambal, until that river enters the British dominions. It then skirts the British possessions in the basin of the Jumna as it goes northward past Agra and Muttra, up to the neighbourhood of Delhi. In contrast to the sandy plains, which are the uniform feature, more or less modified, of the north-west, this south-eastern division has a very diversified character. It contains extensive hill ranges, and long stretches of rocky wold and woodland ; it is traversed by considerable rivers, and in many parts there are wide vales, fertile table-lands, and great breadths of excellent soil. Behind that loftiest and most clearly defined section of the Arvalis, which runs between Aboo and Ajmer, lies the Meywar country, occupying all the eastern flank of the range, at a level 800 or 900 feet higher than the plains on the west. And whereas the descent of the western slopes is abrupt towards Marwar (or the Jodhpur country), on the eastern or Meywar side the land falls very gradually as it recedes from the long parallel ridges, which mark the water-parting, through a country full of high hills and deep gullies, much broken up by irregular rocky eminences, until it spreads out and settles down into the open champaign of the centre of Meywar. Towards the south-western corner of Meywar, the broken country behind the Arvalis is prolonged furthest into the interior ; and hereabout the outskirts of the main range do not soften down into level tracts, but become entangled in a confused network of outlying hills and valleys, covered for the most part with thick jungle, which forms that peculiar region known to British political administration as hilly tracts of Meywar.

The interior of Meywar is generally open and well cultivated, though there are long strips of waste and rocky *sierras*, with single

hills rising here and there in the plains. The easterly course of the main rivers, excepting those in the extreme south-west, indicates the general inclination of the land. Beyond the hilly tracts there is little forest, but much pasture, and the artificial lakes among the low hills are numerous. From November to June this country is easily traversed, but during and after the rainy season many swamps form; the wretched cart tracks are repossessed by the water torrents, which originally cut them out through the hills, and the river beds are often an impassable flood. Beyond Meywar, in the extreme south of Rajputana, lie the petty States of Dungarpur, Bānswāra, and Pertābgarh; the slope is here marked by the drainage of the Māhi River to the south-west, and the ascent eastward, in the direction of the Vindhya, is very clearly marked. This country is hilly and much occupied by jungle.

All the south-east of Rajputana is watered by the drainage of the Vindhya carried north-eastward by the Banās and the Chambal Rivers. The south-east corner is occupied by the Jhālāwar State, which belongs properly to the Malwa country, and a long narrow strip called the Chaumehla runs almost due south into Maratha territory. But to the north of Jhālapātan the whole country on the eastern side of Rajputana rises by a very distinct slope upward to the level of a remarkable plateau called the Patār, upon which lies almost all the territory of the Kota State, with parts of Būndi to the north of Kota, and of Jhālāwar to the south of it. From the south this table-land is ascended by three distinct steppes or elevations out of the Malwa plain, and the line of hills which marks its eastern edge runs round by Chitor to Māndalgarh. Thence its north-western face is very distinctly marked by the line of the Būndi hills, which run like a wall from Māndalgarh north-west to Indargarh, and by the roundabout course which the Banās River takes to avoid the high ground in pushing its way north-east towards a junction with the Chambal. The general slope of this plateau to the north-east is signified by the course of the Chambal River, which forces its waters in a very striking manner from their source in the highlands of the Vindhya through the three steppes before mentioned, until it reaches the main table-land of trap rock. Through this it drives a deep bed like a railway cutting, with banks a hundred feet high or more on each side, until it emerges into lower levels in the north-west beyond its junction with the Banās.

Eastward the plateau falls towards the Gwalior country and the catchment of the Betwa River so gradually, that the general aspect of the interior would not suggest a raised plateau, though the three low steppes leading up to it from the south and west are very distinctly contoured. The surface of the plateau is very

diversified; wide uplands, more or less stony, broad dips or levels containing deep black culturable soil between hills, with rugged and irregular summits, sometimes barren and sometimes covered with vegetation. Between the Chambal and the Parbati Rivers there is a considerable tract of rich black soil. Beyond the Patár, to the north-east of the junction of the Banás and Chambal, there is a very rugged region along the frontier line of the Chambal in the Karauli State; several ranges of no great height form an irregular wall, parallel to the river's course, which separates the river basin from the uplands; and about Karauli town is a labyrinth of ravines. Further northward the country smooths down and opens out towards the Bhartpur territory. It is traversed by constant ranges of hills, which break the landscape; but gradually the chains part into single hills, and the single hills become rarer, while the fertile levels expand and smooth out, until the land, sloping eastward, settles down into the flat plains of Bhartpur, which belong to the alluvial basin of the Jumna.

SECTION II.—GEOLOGY AND MOUNTAIN SYSTEM.

PART I.—SKETCH OF THE GEOLOGY OF RAJPUTANA.*

Rajputana may be divided into three geological regions,—a central, and the largest, comprising the whole width of the Arvali system, formed of very old sub-metamorphic and gneissic rocks; an eastern region, with sharply defined boundary, along which those most ancient formations are abruptly replaced by the great basin of Vindhyan strata, or are overlaid by the still more extensive spread of the Deccan trap, forming the plateau of Malwa; and a western region, of very ill-defined margin, in which, besides some rocks of undetermined age, it is more or less known or suspected that tertiary and secondary strata stretch across from Sindé, beneath the sands of the desert, towards the flanks of the Arvalis.

Of the central Arvalis there are no reliable observations. It is tolerably certain, however, that these consist largely, if not entirely, of the same rocks as are found in the northern extensions of the range, forming detached hills and ridges in Ulwar and Bhartpur, Delhi and Gurgaon, where they gradually disappear beneath the deep alluvial deposits. These hills exhibit a very complicated series, made up of strong quartzites, slates and limestones, schists with much hornblende rock, and pseudo-gneiss. It is probable that when these are examined in more connected outcrops, it will be possible to make out distinct formations with a

* By H. B. Medlicott, Esq., Superintendent of the Geological Survey of India.

normal order of sequence. At present they are spoken of collectively as the Arvali rock-series. In a few places they are seen in abrupt contact with a much older gneiss.

Although there are frequent irregular foldings of the strata, the north-north-easterly strike of the Arvali system is very predominant. At the southern extremity of the region in Guzerat, the gneissic rocks seem to preponderate. There is probably a gradual change throughout the region from one condition to the other.

Several of the minor States of Eastern Rajputana belong in whole or in part to the eastern geological region—Dholpur, Karauli, Búndi, Kota, Jhálawar, Jawad, Pertábgarh, Bánswára. The boundary of the Vindhyan formation is everywhere a marked feature—an abrupt scarp of sandstone. From Futtehpur Sikri it runs in a steady south-west direction to near Chitorgarh. Here it bends southwards, then south-east to Mandesor, when it passes under the Malwa trap. From Pertábgarh to Jabuah and the Narbada valley, this latter rock forms the scarp of the Malwa plateau, overlooking the Arvali region. All these Vindhyan strata belong to the upper division of that great rock-system. The basin stretches from Chitorgarh to Sasseram in Behar. These Upper Vindhyan are again divided into three principal groups—Banrer (Bandair), Rewa, and Kaimur (Kymore), each consisting of strong bands of sandstone, overlying thick masses of shales with occasional limestone. These are all well represented in the area under notice; the alternating arrangement of harder and softer strata, and their more or less horizontal position, produce the characteristic features of the country,—the scarped plateaux and the long ridges having one steep face and one gentle slope. The age of the Vindhyan rocks is quite unknown, save that they cannot be later than palæozoic. A discovery of fossils in them would be of the greatest interest to Indian geology.

The horizontal flows of the Malwa trap continue the plateau-features of the adjoining Vindhyan area, but in less constant dimensions, owing to the more variable thickness and extension of hard and soft beds. There are many varieties of these eruptive rocks. Mineralogically they all belong to the basaltic family, but the differences of structure and texture produce great superficial contrasts: the ball-structure is very common, but sound amorphous beds occur everywhere; columnar structure is more rare; vesicular, amygdoloidal, and porphyritic characters are frequent. The earthy, ash-like beds exhibit like changes of colour and texture. The age of this trappean formation is fixed as upper cretaceous, or as lowest tertiary. In many places there are intertrappean sedimentary beds with fresh-water fossils, showing, with other facts, that the eruptions were sub-aerial.

The western area consists of an immense sandy waste, extending from the flanks of the Arvali Mountains to the frontiers of Sind. This tract does not contain a single stream west of the Loni, and the greater portion of the surface is covered with blown sand. The geology is only known from a few traverses, and rocks are but seldom seen, being usually concealed by the covering of sand.

The only crystalline rocks hitherto found in this area are some compact quartzose porphyritic schists, of which it is difficult to say whether they were originally of volcanic or sedimentary origin. They now resemble Lydian stone, but contain small crystals of pink felspar, and they are associated with syenite. They form some scattered hills near Balmer, a number of small rises south-west and south of Jodhpur, and some larger hills south of the Loni River, near Jasol. They are also found at Jodhpur, where they have a more decidedly volcanic character; and at Pokaran, west-north-west of Jodhpur. Close to Pokaran some hardened shales, containing huge boulders in places, rest upon the crystalline rocks. The next formation in ascending order is a coarse, massive red sandstone, largely developed around Jodhpur, and between that town and Pokaran. This rock may perhaps be Vindhyan, though it looks more recent than any known Vindhyan sandstone. Sandstones of later date are found at Balmer, and form some hills to the north and west of that town, and the same beds apparently recur to the west and south of Jesulmer, where they are much mixed with dark-coloured ferruginous bands. They only contain plant remains, which are rarely in a state fit for identification. Upon these sandstones rest other sandstones and limestones, the latter abounding in marine jurassic fossils. It is probable that the lower sandstones with the ferruginous bands belong to the same series, and are very little older.

The oolitic beds extend for some distance west of Jesulmer, and upon them rest nummulitic limestones, of which, however, very little is seen. Oolitic beds are also found in Párkár, north of the Runn of Kutch.

PART II.—MOUNTAINS AND HILL RANGES.

Of mountains and hill ranges, the Arvalis are by far the most important. In the opening chapter some attempt has already been made to describe how they mark off the whole of Rajputana into two natural divisions; and their elevated masses of course influence the climate, collecting the waters and directing the outfall of all the western rivers. They contain, indeed, one of the watersheds of India, and supply some of the most distant

sources of the Gangetic drainage. Taking the range from the north-east, its first appearance on a large scale is near Khetri (latitude 28° , longitude 76°), in the north of the Jaipur State, though detached peaks may be traced at long intervals almost to the well-known ridge at Delhi. Near the village of Babái, in Khetri, the range attains an altitude of 2,600 feet above the level of the sea, and then trending in a south-west direction displays the higher groups of Kho (3,212 feet), Ragonáthgarh (3,450 feet), and the sacred mount of Harasnáth (2,998 feet), in the Sikar district. Hence, skirting the western limit of the Sámbar Lake, it continues in the same direction to Ajmer, and here begins to widen out considerably, several parallel ranges appearing, which are for the most part mere sharp ridges, with precipitous sides, enclosing deep cultivated valleys, running north-west and south-east, the highest points ranging from 1,000 to 2,000 feet above the plain. One of the most conspicuous peaks in this neighbourhood is that on which stands the famous fort of Táragarh, overlooking Ajmer town from a height of 2,855 feet above sea-level. From Ajmer south-west towards Beáwar the hills are less imposing, but they gradually close up until south-west again of Beáwar they begin to assume the consistency and compact elevation of a range, separating the plain of Marwar from the upland country of Meywar. From near Beáwar, south-west for about 70 miles, the strip of hill country enclosed by the Arvalis is called Merwarra, from the peculiar tribe of Mers which inhabit it. There are here no striking mountains; the highest peaks rise about Todgarh to an elevation of 2,853 feet, the average level of the valleys being about 1,800 feet. There are three well-known passes across the upper part of this country, but further south-westward it is only crossed by mountain tracks. Beyond Merwarra the average width of the range may be 25 miles in parts, and it may be described as an intricate mass of hills, from among which rise lofty ridges elevated here and there to 4,000 feet above the sea-level. This ridge formation is the characteristic of the Arvalis; where it most prevails, there may be seen two or three ridges running parallel to each other, barring the passage like walls of such perfect straightness and symmetry that, when looked at endwise, they appear to be separate conical eminences, while seen broadside they show 14 or 15 miles of even length. Such a formation accounts for the great difficulty of communication across this section of the Arvalis between Meywar and Marwar. Several paths are known and used; but the only pass really practicable for wheels and general traffic is that which comes down by Dasuri into Marwar, through a gap which presents a very tolerable gradient.

The culminating point of the main range rises above the village

of Jargo (latitude $24^{\circ} 58'$, longitude $73^{\circ} 33'$) to the height of 4,330 feet above sea-level. Further south-west the hills decrease in height and spread out, until the chain loses its distinctive formation amid wide tracts of hilly wastes extending southward over the whole western half of Meywar. A line drawn, for example, from Mount Aboo in the Sirohi State due east to the town of Oodipur would intersect a country of interminable hills; and they stretch southward with a gradual depression of general level to the valley of the Som River, where it marks the frontier between Meywar and Dungarpur. The town of Oodipur stands on the western edge of a vale, or piece of open tract, encompassed by the hills, inasmuch that the only practicable access is by passes more or less open. The country between Sirohi and Oodipur town is described as "a wonderfully interlaced series of hills alternating with defiles, with barely a valley, much less a plain, anywhere;" though Ogha and Panarwa, the head-quarters of the principal Bhil Chiefs, are villages in a narrow strip of fertile vale. The communications are of the roughest; they are mere tracks along the beds of torrents, following the gradients which have been gradually cut by the hill waters, crossing continually the tortuous streams from bank to bank, sometimes winding through deep defiles, and sometimes fetching a circuit to get round huge transverse dykes which the water has cut through without leaving room for a footpath to follow along the sides of its channel.

On the south-eastern slope of the Arvalis, the ascent through Meywar is so gradual as to be hardly noticed until the head of a pass is reached, when the abrupt fall into the Marwar plains below, and the breadth of the prospect over the flat sands westward and northward, show the elevation which is being crossed. The western slope is abrupt, and in parts very steep; it is also better wooded than the eastern side, because it has some advantage in the rainfall, and because the forests are less accessible to the wood-cutters.

Mount Aboo, which is specially described elsewhere, belongs by position to the Arvali range; it is a cluster of hills, with the highest peak rising to 5,653 feet above the sea, standing away about 7 miles from the western face of the range, and rising very suddenly up from the flat plain, like a rocky island lying off the sea-coast of a continent. A narrow valley separates Aboo from a very difficult and rugged district of the Arvalis, well known as the *Bhākar*, notorious as the refuge for marauders and out-laws.

The other hill ranges of Rajputana, though numerous, are comparatively insignificant. The towns of Ulwar and Jaipur lie among groups of hills more or less connected by lines starting from a place called Rājgarh, 30 miles south of Ulwar, and run-

ning northward to the Ulwar group, and westward to the Jaipur group. In Bhartpur country there is also a range of some local importance, to which belong the heights of Biána and Alipur (1,357 feet). South of these, again, are the Karauli hills, whose greatest height nowhere exceeds 1,400 feet. In the eastern States, a low but very well defined range runs transversely south-west and north-east from Mándalgarh in Meywar, across the Búndi territory to about Indargarh in the north-east, near the Chambal. These hills present a clear scarp for about 25 miles on their south-eastern face, and give very few openings for roads, the best pass being that in which lies the town of Búndi, whence they are called the Búndi hills. There is also a series of steep hills running along the northern or left bank of the Chambal, as a sort of continuation of the Búndi hills through Karauli into Dholpur.

The Makandarra range runs across the south-western districts of the Kota State from the Chambal to beyond Jhálrapátan. It has a curious double formation of two separate ridges, running parallel at a distance of more than a mile; the interval being filled up with dense jungle, and in some parts with cultivated lands. It is an important feature in the landscape, and marks a considerable drop of general level towards the south. It takes its name from the famous pass in which Colonel Monson's rear-guard was cut off by Holkar in 1803.

There are no other definite hill ranges worth mention. It will be understood that the whole of Rajputana, excepting only the sandy deserts, is studded with occasional hills and isolated crags, and even so far as Balmer, in the west of the Marwar country, there are one or two rising to nearly 1,000 feet. And all the southern States are more or less hilly, especially Bánswára and Dungarpur, and the southernmost tracts of Meywar.

PART III.—USEFUL MINERALS OF RAJPUTANA.*

Metallic ores.—Compared with many parts of peninsular India, Rajputana may be considered as rich, if not in the quantity, at least in the variety of metals which it produces. No ore of cobalt is known from any other locality in India; and although zinc blend has been found elsewhere, Rajputana is the only part of the country in which zinc is known to have been extracted. Copper and lead exist in several parts of the Arvali range, and of the minor ridges in Ulwar and Shekhawati, and iron ores abound in Ulwar, Meywar, about Nímach, Kota and Jhálawar. Unfortunately the details are in most cases wanting; only a very small portion of the country has been geologically examined,

* These notes upon Minerals were kindly furnished by Mr. W. Blanford and Mr. A. O. Hume.

and little or nothing is known as to the probable abundance of valuable minerals. It may, however, be safely asserted that in many localities, perhaps in the majority, the quantity of ore produced is small, and not likely to be largely increased by improved processes of mining; but the extensive works of past times can only be explained by supposing that considerable deposits of metallic minerals formerly existed, and it is far from probable that they have been exhausted. The mines hitherto worked are believed to be of but small depth, and in no case have they been sunk far below the level at which water accumulates from springs, the elaborate machinery necessary for draining deep mines being beyond the means of the miners, if not beyond their mechanical knowledge.

Copper.—Perhaps the most important copper mines are those near Khetri, in Shekhawati, a province of Jaipur. The ores are copper pyrites, mixed, it is said, with grey copper ore (fahlerz or tetrahedrite); some carbonates also occur, and native copper has been found. Near the surface also, in the shales, blue vitriol is produced by the decomposition of the pyrites. In the same mines the cobalt mineral, to be presently noticed, is also obtained. The ore occurs in small veins.

The Khetri mines must have produced copper for a long period. Some of the hills in the neighbourhood are honey-combed with old excavations, and the heaps of slug from the furnaces have accumulated, until, in the course of time, they are said to have formed a range of hillocks several hundred feet in length and from 30 to 60 feet high, some of the rises having even been fortified.

In the Ulwar State the most important copper mines are at Daribo, about thirty miles south by west of the town of Ulwar. The ore here, as at Khetri, consists of copper pyrites, mixed, however, in the present instance with arsenical iron pyrites. No distinct lode occurs, but the ore is irregularly disseminated throughout some black slates intercalated in the Ulwar quartzites. Some copper has also been procured at Kushalgarh, Indawas, Pertágarh, Baghani, Bhángarh, and some other places south-west of Ulwar.

In Jaipur a little copper has been procured in the range of hills between Lalsot and Nitahar to the east of the principal town. In the neighbourhood of Ajmer also some copper ore has been mined about Gogra, Rájgarh, and Rajauri, and traces of ores have been found between Kishengarh and Rájgarh. A copper mine is also said to have been formerly worked near Sirohi.

Lead.—Extensive lead mines exist on the east face of Táragarh hill, close to Ajmer, and in some of the neighbouring hills,

but the workings have been abandoned of late years. In 1830 the annual produce of lead is said to have been about 850 cwts., and attempts were then made to increase the yield of ore by draining the mines, but no permanent improvement appears to have been produced. The ore—galena or sulphide of lead and carbonate—is said to have occurred in small veins parallel to the bedding of the rock, which on Táragarh dips at a considerable angle to the south-east.

Another locality for lead is near Gudha, in Jaipur, where galena containing some silver was found a few years ago in limestone, but the quantity of ore obtained was small. It is also said that some lead ore occurs in the neighbourhood of Jodhpur.

Zinc.—At Jawar, south of Oodipur, zinc is said formerly to have been obtained in considerable quantities. The ore is calamine or carbonate of zinc, and appears, judging from the specimens examined, to have been poor in the metal; but the mines must have been extensive, for they are said in Tod's *Rajasthan* to have yielded Rs. 2,22,000 a year.* This is probably greatly exaggerated. The mines in this locality were abandoned in consequence of a famine in 1812-13, and they have not been reopened. There are also remains of old zinc furnaces at Sojat, in Jodhpur.

Cobalt.—The only known Indian ore of this metal is a grey metallic substance known as "*sehta*," occurring in small cubes mixed with pyrrhotite (magnetic iron pyrites) in the copper mines of Khetri (Shekhawati). The composition of the mineral, which has received the name of Jyepoorite (wrongly written Syepoorite in most books), is still imperfectly known; it was at first supposed to be a simple sulphide of cobalt, but subsequent examination has rendered it probable that antimony and arsenic are also contained in the mineral. The ore was formerly extensively used for colouring enamels, bangles, &c., of a blue colour, and, it is said, for giving a rose colour to gold—an art unknown in Europe, and deserving of further enquiry.

Iron.—Large deposits of specular and magnetic iron ore (hæmatite) occur in several places in the Arvali rocks. Amongst the localities are Bhángarh and Rájgarh, south-west and south of Ulwar; the neighbourhood of Ajmer, where some old workings exist near the jail; the Biána hills, in Bhartpur; the Búndi hills, and various localities in Jodhpur, Kota, &c. These ores are worked to some extent on a small scale to supply native furnaces. Some nickel has been found in iron made from the Bhángarh ore.

* Vol. I, p. 504, note.—According to Tod, the metal was tin, not zinc, but this is probably a mistake. He states that mines at Dariba also produced Rs. 80,000 annually.

Other mineral products.—Alum and blue vitriol (sulphate of copper) are manufactured from decomposed schists at Khetri, in Shekhawati.

Building and ornamental stones.—Good building materials are obtained from many of the Rajputana rocks. The ordinary quartzite of the Arvalis is well adapted for many purposes, and the more schistose beds are employed as flag-stones or for roofing. One or the other is found almost throughout the Arvali ranges. Slates are found in the Ajabgarh group of the Ulwar hills, and have been quarried at Magri, near the northern border of the Ajmer territory, for use in covering the railway buildings; extensive beds of slate are also found in the Búndi hills. Limestone is abundant in some parts of the country, as in Ulwar, Búndi and Jesulmer, and is employed both for building and for burning into lime; but there is not unfrequently a deficiency of this rock over large areas. Two Rajputana forms of limestone, however, stand pre-eminent amongst the ornamental stones of India for their beauty, and they are, perhaps, the only kinds which are well known beyond the region itself. The first of these is the Raialo limestone of the Ulwar group of rocks, quarried at Raialo and Jheri, in Ulwar, and at Makrána, in Marwar, or Jodhpur, twelve miles west of the Sámbar Salt Lake. It is a fine-grained crystalline marble, the finest qualities being pure white in colour, whilst other forms are red or variegated. The Makrána quarries supplied the chief portion of the stone employed in building the Táj at Agra, and the marble employed in decorating many buildings in Northern and North-Western India was procured in the same neighbourhood. About 1,000 workmen are still engaged in quarrying and working the stone at Makrána, besides those engaged in the Ulwar quarries. These men are skilled in cutting the peculiar perforated screens (*jáli*) used in Mahomedan tombs and in other buildings.

The second remarkable stone is the limestone of Jesulmer, a rock of far later geological age than the ancient Arvali series; for it contains fossils of jurassic age. This limestone is very fine, even-grained and compact, of a buff or light-brown colour, and is admirably adapted for fine carving. Slabs have been transported to Upper Sind and used for Musalman tombstones, and these, although of considerable antiquity, are generally remarkable for the sharpness of the engraving. The Jesulmer limestone has also been employed as a lithographic stone, and was at one time brought to Calcutta for this purpose.

Sandstone derived from the Vindhyan formation is much used for building in Bhartpur to the eastward, and in Jodhpur to the west of the Arvali range, and a fine sandstone obtained from

water thus poured into the lakes would, in the course of long ages, result in a saline accumulation, such as we now find in their bed.

The more important of these lake sources are *Sámbar* on the borders of Jaipur and Jodhpur, where the best salt of all is produced. *Kachor-Rewassa* in Shekhawati, a dependency of Jaipur; *Didwána* and *Phalodi* in Jodhpur; and *Lonkára Sur* in Bikanir. Similar, but less important, are *Chápur* in Bikanir, *Pokharan* in Jodhpur, and *Kanod* in Jesulmer. None of these sources are at present worked to anything approaching their full capacities, but the present outturn of the more important may be approximately stated as follows :—

<i>Sámbar</i>	30	lakhs of maunds.
<i>Kachor-Rewassa</i>	1½	„
<i>Didwána</i>	4	„
<i>Phalodi</i>	1½	„

The outturn of the remaining lake sources is inferior in quality and comparatively small in quantity.

But although these lake-like depressions constitute the most important single sources and yield, some of them, the highest qualities of salt; the aggregate outturn of the innumerable *earth-works* referred to above has been very great in past times. In Bhartpur, almost throughout the State, works of this description formerly existed, producing in favourable seasons something like 16 lakhs of maunds of fair, small-grained salt. All these were closed in 1876, as it was considered that, owing to the great reduction in the price of *Sámbar* salt consequent on our administration of the lake, the Bhartpur manufacture could no longer be profitably carried on. A few such works existed in Ulwar; between 700 and 800 yielding about 3 lakhs of maunds in Jaipur, and some 400 turning out about 2½ lakhs of maunds in Marwar. All these which, though producing some fairly good salt, produced much that was very inferior, have been, or will be, closed in pursuance of agreements entered into with the several Chiefs for the more effectual protection of the Imperial salt revenue in view to the abolition of the Inland Customs line.

A third class of sources remain to be noticed. The beds of rivers, draining tracts similar to those whose drainage annually fills the lakes, are found, especially towards their estuaries, more or less saliferous; and on their banks in the hot seasons, when the rivers cease to flow, natural salt deposits of greater or less extent occur, and where the soil is of such a nature that the brine can be retained and concentrated, manufacture by digging pits and wells in which the brine is retained and gradually evaporated, can be largely carried on.

of Marwar—the fall scarcely averages more than 5 inches, as the rain-clouds have to pass extensive heated sandy tracts before reaching these plains, and are emptied of much of their moisture upon the high ranges in Kattywar and on the nearest slopes of the Arvalis. In the south-west, which is more directly reached, and with less intermediate evaporation, by the periodical rains, the fall is much more copious; and at Aboo it sometimes passes 100 inches. But except in these south-west highlands of the Arvalis, the rain is most abundant in the south-east of Rajputana.

Along the southern States, from Bánswára to Jhálawar and Kota, the land gets not only the rains from the Indian Ocean, which sweep up the valleys of the Narbada and Máhi Rivers across Malwa to the countries about the Chambal, but also the fag end of the rains which come up from the Bay of Bengal in the south-east; and this supply occasionally reaches all Meywar. In this part of the country, if the south-west rains fail early, the south-east rains usually come to the rescue later in the season; so that the country is never subjected to the extreme droughts of the north-west. *On the other hand, the northern part of Rajputana gets a scanty share of the winter rains of North India, while the southern part usually gets none at all, beyond a few soft showers about Christmas. In the central districts, about Ajmer and towards Jaipur, the periodical supply of rain is very variable. If the eastern winds are strong, they bring good rains from the Bay of Bengal; whereas if the south-west monsoon prevails, the rain is comparatively late and light. Sometimes a good supply comes in from both seas, and then the fall is larger than in the eastern districts; but it is usually much less. In the far north of Rajputana the wind must be very strong and the clouds very full to bring any appreciable supply from either direction.

It may be said shortly, that from Bikanir and Jesulmer in the north-west to Pertábgarh and Kota in the south-east, there is a very gradually increasing rainfall, from 5 to about 45 inches, the quantity increasing very rapidly after the Arvalis have been crossed. Statistics are not very plentiful; but the subjoined table gives the average rainfall in late years at certain places, which, being wide apart, may afford an indication of the state of the mountainous districts, and then generally of the whole tract.

Table illustrative of the rainfall of Rajputana divided by the Arvali hills into three sections.

Section of country.			Sub-division.	Station.	Number of years taken.	Last year of series.	RAINFALL.			
							Aver- age.	Maxi- mum.	Mini- mum.	
I	Eastern fertile.	or {	North South	Bhartpur ... Jhálrapátun	5 3	1876 1876	32 40	41 50	13 25	
II	Central hilly.	or {	Central South	Ajmer ... Meywar	11 11	1876 1876	24 23	35 43	9 12	
III	Western barren.	or {	North	Bikanir ...	4	{ 1872 1874 1875 1876 }	8	10	7	
			South	... ..	3	{ 1872 1875 1876 }	20	25	14
IV	Exceptional elevation 4,000 feet.		South	Aboo ...	17	1876	68	123	31	

In the summer, the sun's heat is much the same all over the province, and, except in the high hills, is great everywhere; in the north-west very great. Hot winds and dust-storms are known more or less throughout, but in the sandy half-desert tracts of the north they are as violent as in any part of India, while in the southerly parts they are tempered by hills, verdure, and water. In the winter the climate of the north is much colder than in the lower districts, with hard frost and ice up on the Bikanir borders; and from the great dryness of the atmosphere in these inland countries, the change of temperature between day and night is sudden, excessive, and very trying. The heat, thrown off rapidly by the sandy soil, passes freely through the dry air, so that at night water may freeze in a tent where the thermometer marked 90° at one time of the day.

The influence of these climatic conditions upon the general health may be shortly noticed. We find an irregular, and in some parts a very scanty, rainfall; excessive dry heat during one season of the year, and great variation of temperature during another; we have vast sandy tracts in the north-west, an immense extent of salt deposit, and a water-supply in parts very deficient, brackish, not good for drinking, and sometimes failing altogether. The epidemic diseases which might be expected, and which actually do prevail, are principally of the paroxysmal or

malarious type. Cholera visitations occur, though most virulently in the eastern States, for the sparsely-populated and semi-desert nature of the western tracts, over which the winds travel freely, prevents the spread of cholera in those directions. The condition of the water-supply, and the comparative poorness of the grain, *bājri* (*Holcus spicatus*), which forms the staple food of the people in the north-west, give rise to dyspeptic maladies, and secondarily, to skin diseases and affections of the cellular tissue. But positive death and famine are the epidemics which have periodically desolated Northern Rajputana, caused by failure of the always uncertain rainfall. Within the last thirty years, in 1848-49, and in 1868-69, two very serious famines have deeply affected the whole condition of the people, the second famine having been violently intensified by the ravages of locusts, which breed in the deserts by myriads.

Of vital statistics there are yet none for Rajputana as a whole, though some records have been made in Ajmer which indicate a very low death-rate. It is certain that, notwithstanding all its drawbacks, and excepting some towns urgently needing sanitary reforms, Rajputana may be reckoned one of the healthiest countries in India, at least for its natives. The moderate rainfall, the free play of the winds over the surface, the sparse population, the absence of great cities, and the plentiful supply of salt, may be suggested as some reasons why the inhabitants live long and thrive well.

SECTION IV.—FORESTS.

PART I.—FOREST TOPOGRAPHY.

In Rajputana there are no large timber forests, though the woodlands are extensive upon the south-western Arvalis and throughout the hilly tracts adjoining, where the rainfall is good. Mount Aboo especially is well-wooded from summit to skirts, and possesses several valuable kinds of timber; and from Aboo north-westward the western slopes of the range are still well clothed with trees and bushes up to the neighbourhood of Merwarra. Below the hills on this western side runs a belt of jungle, sometimes spreading out along the river beds for some distance into the plain. All vegetation, however, rapidly decreases in the direction of the Loni River, and beyond that river, Marwar, Bikanir, and Jesulmer have scarcely any trees at all, except a few plantations close to towns or villages. In this desert region, the *bābul* (*Acacia arabica*); and the *nīm* (*Melia azadirachta*) manage best to live. The *dhao* (*Anogeissus pendula*)

is here and there fairly plentiful in the north-eastern States; the tree, though only fit for fuel in the plains, reaches a goodly size on the heights of Aboo.

In Scrohi, and all over the south-western part of Meywar, the woodlands stretch for miles and miles, covering the endless hills with scrub jungle and the valleys with thickets. In many places teak and other valuable timber trees would thrive very well if the forests were not periodically ruined by the Bhils and other half-savage dwellers in these tracts. Here, as elsewhere in the Indian backwoods, the practice of cutting down the woods and burning them on the ground in order to clear room for a field which is manured by the ashes, goes on most destructively. After two or three years' crop the soil is exhausted, and then another felling takes place. Moreover, the woods are set on fire annually to improve and open out the grass for pasture, or to facilitate deer-hunting, and all these wasteful ways of subsistence are being followed on a much larger scale as the forest tribes find it more and more difficult to live by robbery, and, being pent up within their own wilds, are compelled to draw their food from the soil. In the eastern states the woodlands are considerable. South of the Banás and along parts of the Chambal there are immense wolds, covered for the most part with small trees, and near the capitals of the States and around the forts of the principal Chiefs the woods have occasionally been carefully preserved for game or for defence, while deep thickets may often be seen which are sacred to some deity. The southernmost States of Bánswára, Dungarpur and Pertábgarh are perhaps the most wooded in proportion to their area.

In the State of Bhartpur there are some valuable reserved woodlands, one of which occupies an area of some 40 square miles, and is properly worked for fuel.

Nowhere, however, have the woods been more closely shaved off the hill-sides than in the British district of Ajmer. Around Ajmer itself this is probably due to the fact that for generations the country has been cultivated and comparatively civilised; but in the south-western portion of the district called Merwarra, there are tracts now very bare, which were described in 1819 as an impenetrable jungle. Here, again, the pacification of a predatory tribe and its conversion to living by industry, the growth of the neighbouring towns, and the general spread of agriculture under British rule, have naturally combined to give a strong impulse to the reckless clearance of the woods. Large wastes have now been set apart in the hope of gradually repairing these losses by careful conservation.

PART II.—FOREST FLORA.*

As might be expected from its geographical position and limited rainfall, the flora of Rajputana is not a rich one. The number of indigenous species is but small, and few of these are attractive in appearance. The province is divided by the Arvali range of hills into two unequal parts—the part to the eastward of the range lying in the basin of the Chambal, and that to the westward in the basin of the Indus. This division is, to a great extent, coincident with certain features in the physical configuration, meteorology and vegetation of the province; and these two portions may therefore be conveniently treated of separately. The vegetation of the dividing range itself, and of the outlying mountain mass of Aboo, so much more resembles that of the eastern than of the western tract, that it may be treated along with the former.

Eastern Rajputana.—The country to the east of the Arvali is (with the exception of the Jaipur State) more or less hilly, and has a climate and a flora resembling those of Central India and the North-Western Provinces. Where not actually hilly, the surface is, to a considerable extent, undulating. Cultivation is, on the whole, scanty, and is chiefly confined to the lower and flatter lands, while the higher parts remain to a large extent covered with their original vegetation, and on them may be found in abundance plants which, in the more completely cultivated provinces of North-Western India, are confined to the comparatively small tracts of waste and unreclaimed land.

As is the case in other parts of India with a similar vegetation, the majority of the trees and shrubs come into flower during the hot season, while the herbaceous plants blossom chiefly during the rains. Many of the latter are, moreover, annuals which wither and die as the cold season approaches. The cold season corresponds to the winter of temperate countries, and during the whole of it the aspect of the uncultivated parts of the country is brown and barren. The flowering of the shrubs and trees during the hot weather does little towards increasing the beauty of the scenery. On the contrary, it, if anything, intensifies the feeling of barrenness and aridity. With the first fall of rain, myriads of seeds that had lain dormant in the parched soil spring into life, and in the course of an incredibly short time the whole of the country, even to the tops of the barest hills, is clad in a carpet of delicate green, while the pleasant sound of running water can actually be heard in the valleys. The largest

* The Editor is indebted for this part entirely to Dr. G. King, Superintendent of the Botanic Garden, Calcutta.

tree of this part of Rajputana is the semul (*Bombax malabaricum*), which on the Arvalis and Aboo attains a considerable size. The finely buttressed grey trunk, spreading arms and gaudy red flowers of this species make it a striking object in the landscape wherever it occurs. Ranking after the semul in size are *Prosopis spicigera*, *Sterculia urens*, *Semecarpus anacardium*, the two acacias (*Leucophlæa* and *Catechu*), *Anogeissus latifolia* and *pendula*, *Dichrostachys cinerea*, *Cordia rothii*, *C. myxa*, and *Phyllanthus emblica*. These yield both fuel and building timber in parts of the region where neither is over-abundant. *Erythrina suberosa*, with its ungainly trunk and branches, but handsome scarlet flowers, and the pretty geranium tree of the Anglo-Indian (*Bauhinia purpurea*), are not uncommon. *Gmelina arborea*, a tree which yields an excellent timber and which occurs over almost the whole of India and Burma, is found sparingly in the Arvalis. The gum-yielding salai tree (*Boswellia thurifera*), so abundant in the territory to the eastward of the tract, is not uncommon in Meywar and the Arvalis. The dāk or pallās (*Butea frondosa*), which in various parts of Central India covers immense areas to the exclusion of pretty nearly every other tree, is far from abundant in any part of the region. Two terminalias (*Tomentosa* and *Arjuna*), both valuable as timber trees, occur sparingly on the eastern frontier of the tract, but are rare elsewhere. *Schrebera swietenoides*, a little-known and rather rare tree, has been found by Dr. Brandis in Meywar.

Climbing plants are not numerous, the most notable being two species of cocculus (*Villosus* and *Laeba*), *Cissampelos pareira*, *Celastrus paniculatus*, two vines (*Vitis carnosu* and *Vitis latifolia*), and *Mimosa rubicaulis*.

The shrubby vegetation, which in every part of the region is so much more prominent than the arboreal, consists largely of capers, jujubes, famarisks, and *grewias*. Of the capers by far the commonest is *Capparis aphylla*, a prickly leafless shrub with a handsome plum-like fruit, which flourishes over all the driest parts of North-Western India, and extends to Arabia, Nubia, and Egypt; *Capparis spinosa* (which yields the eatable caper) is much less frequent; *Capparis horrida*, a scrambling plant which often climbs on trees, is not uncommon; while a fourth species, *Capparis sepiaria* (indigenous in the south of India), is here and there cultivated as a hedge plant. The small jujube, (*Zizyphus nummularia*), is very abundant, and, covering as it often does, large tracts of country, has great value as a fodder plant: it is also much used for hedges. *Zizyphus xylopyra* is a less abundant species which sometimes, in protected spots, attains to the dignity of a small tree and yields a useful wood, while its bark is used in

tanning. In every water-course tamarisks of several species abound. One of these (*Tamarix gallica*) is a cosmopolitan plant, which is found in suitable localities all over India and Ceylon, in China, Japan, and Siberia; specimens of it have been gathered in Yarkand, in Thibet, at 11,000 feet above the sea, and it is common in many parts of Northern Africa and Southern Europe. *Tamarix dioica*, an exclusively Indian species, is also abundant. Of the grevias, *Grewia populifolia*, *Grewia pilosa*, *Grewia villosa*, and *Grewia salvifolia* are the common species. These all yield tough wood, which, however, is rarely large enough to be of much use; and the fruits of all four are more or less eatable. In addition to these, the most notable shrubs are *Helicteres isora*, the curious spirally curled seed-vessels of which have a fanciful value as a remedy in dysentery: *Celastrus spinosus* and *Celastrus senegalensis*, *Buchanania latifolia*, *Cassia auriculata*, *Woodfordia floribunda* (the scarlet flowers of which are used as a dye), *Casarea tomentosa*, *Diospyros montana*, *Holarrhena antidysenterica* (named from its reputed value as a cure for dysentery), *Calotropis procera*, *Vitex negundo* (esteemed as a remedy for rheumatism), and *Clerodendron phlomoides*. Two cactus-like fleshy *Euphorbias* (*Euphorbia royleana* and *Euphorbia nerifolia*) occur in the hills, but are much less abundant than in the tract to the west of the Arvalis. Bamboos are represented by a single species (*Dendrocalamus strictus*), which attains large dimensions only on Aboo and the higher parts of the Arvalis.

The herbaceous vegetation consists of *Leguminosæ* of the genera *Alysicarpus*, *Desmodium*, *Crotalaria*, *Cassia*, &c., of various widely distributed species of *Compositæ* and *Rubiaceæ*; *Boraginaceæ* being also rather numerous, and *Scrophulariaceæ* less so. During the rains a few *Convolvulaceæ* appear, and grasses and sedges are abundant.

Owing to its heavy rainfall, Aboo is, as regards vegetation, by far the richest spot in Rajputana. On the higher parts of the mountain, humid types appear which are unknown on the plains below. Most noteworthy of these is an epiphytal orchid (a species of *Aerides*) which clings to the mango trees, and in the rains produces fine racemes of delicate pink flowers. The occurrence of a charming white wild rose and of a stinging nettle (*Girardinia heterophylla*) also at once reminds the visitor to Aboo that he has left the arid region below, and recalls to his mind the semi-temperate vegetation of the Himalayas and Nilgiris. Magnificent trees of *Michelia champaca* are found, especially beside the temples, and weeping willows adorn the margin of the lake near the station; but the latter two species have both doubtless been planted. A yellow jasmine (*Jasminum revolutum*) abounds

on Goroo-Sikhur, the highest peak of the mountain; but this is also doubtfully indigenous. *Cratæra religiosa*, with its creamy yellow flowers and delicate-tinted stamens, is common on the middle and lower slopes of the hill; while *Carissa carandas* is so abundant, that during part of the hot season its pretty white flowers scent the air for miles round the station with their delicious fragrance. The prevailing tree on the slopes of Aboo is the mango. It is doubtfully indigenous, and was probably originally introduced by the numerous pilgrims who have for ages frequented the sacred shrines for which the mountain is famous. Now, however, it is thoroughly naturalised, and is the commonest of the larger trees. *Pongamia glabra* is found in several of the lower valleys of Aboo (wherever it occurs on the plains below it has usually been planted), and *Sterculia colorata* is not uncommon. Shrubby and herbaceous *Acanthaceæ* of several species abound. Very common also is *Mallotus philippinensis*, the powder covering the capsules of which forms at once a valuable dye-stuff and an efficient vermifuge. On the lower slopes of the mountain, and in the dense belt of jungle which surrounds its base, are found most of the species which are characteristic of the plains. Many of the latter (for example, *Salvadora persica*) ascend to the very highest peaks of the mountain, and thus intermix with the more temperate forms which are confined to the latter.

Of introduced Indian plants which are found usually in gardens or near villages over the whole of the eastern tract, the most prominent are the peepul (*Ficus religiosa*), the banyan (*Ficus bengalensis*), the gular (*Ficus glomerata*), the ungeer (*Ficus virgata*), the mulberry (*Morus alba*), the tamarind (*Tamarindus indica*), the mango (*Mangifera indica*), the ním (*Melia azadirachta*), the bábul (*Acacia arabica*), the ber (*Zizyphus jujuba*), the siris (*Acacia lebbek*), the jamun (*Eugenia jambolana*), the mehndi (*Lawsonia alba*), the pomegranate (*Punica granatum*), and the peach (*Amygdalus persica*). *Mimusops indica* and *Elengi*, *Ailanthus excelsa*, and *Flacourtia ramontchi*, are also occasionally met with. The bábul is quite naturalised in spots where the winter cold is not too intense and where the sub-soil retains a little moisture: its timber and bark are both highly prized. Among fruit trees cultivated in gardens, two American species are very common; these are the custard apple (*Anona squamosa*), and the guava (*Psidium guava*). *Argemone mexicana*, *Parkinsonia aculeata*, *Opuntia dillenii*, and *Acacia farnesiana* (also introductions from America), are frequently met with. *Nerium odorum*, a shrub closely allied to, if not identical with, the oleander of Southern Europe, is also common in gardens.

Western Rajputana.—To the westward of the Arvalis the country is much flatter and drier, and as the Sinde and Punjab frontiers are approached, it passes into actual desert. It is, however, by no means destitute of hills, for numerous low ridges of a red sandstone rise here and there, and in other parts there are undulating areas of hardened sand. The rest of the country is for the most part a plain of loose sand, which, everywhere more or less saline, becomes increasingly so towards the south-west, where the Loni loses itself in the Runn of Kutch. Except that they support a few of the fleshy *Euphorbias* already mentioned, many of the hilly ridges are utterly barren. The little rain that falls on these bare rocks is at once carried off in rapid torrents which are often lost in the sand at a short distance from their bases. The few torrents which do succeed in carrying their water to any distance unite to form the Loni, the one river of this part of the country. But although water can be had by digging at certain parts of its bed at almost any season of the year, and stagnant pools may here and there be found at all times, it is only during the brief and scanty rainy season that anything like a continued current can be seen in any part of the Loni. The rainfall, which over the whole area is scanty and uncertain, gradually diminishes as the Sinde and Punjab frontiers are approached. Erinpura, a station near the base of the Arvalis, has a rainfall of about 12 inches in the year; whereas Western Marwar, Jesulmer, and Bikanir have probably less than a third of that amount.

It must not be supposed that the Arvali range forms a rigid boundary separating two distinct floras; on the contrary, the majority of the plants already mentioned as characteristic of the eastern tracts are found on the west of the range. Near the base of the Arvalis the soil is good and supports a belt of what would for Western Rajputana be a comparatively luxuriant vegetation, were it not ruthlessly preyed on by the inhabitants for fuel and timber for themselves and fodder for their cattle and camels. In passing westward from the Arvalis, such of the species already mentioned as are unable to withstand the increasing dryness of the climate and the saltiness of the soil, are represented in gradually diminishing numbers by stunted, half-starved specimens, and the majority of them finally disappear altogether. On the other hand, a few species of a thoroughly desert type gradually appear, and these latter increase in proportion to the former, until on the western frontier of the region they form almost the entire vegetation. These desert plants are outliers of the Arabian and North African flora, and are common to all low-level Asiatic deserts, while some of them penetrate even to the comparatively

high arid tracts of Central Asia. Next to the floral poverty of this tract, the most notable fact that strikes the observer is the tendency of plants, which in moister regions are herbaceous, here to become tough and shrubby, and of the whole vegetation to develop epidermal armature in the shape of hairs and thorns. The common weed (*Solanum jacquinii*) which in the Gangetic plain is moderately covered with stiff bristles, here presents the appearance of a vegetable hedgehog. The spines of the bábul are about twice as long and as thick as they are in Malwa, while the small ber bushes, everywhere formidable, are here little more than mere bundles of spines.

The largest trees in Marwar are those that have been planted in gardens and near tanks or wells. Hardly one of any indigenous species is ever found exceeding ten or twelve feet in height. The commonest of these latter are *Prosopis spicigera*, *Salvadora persica*, *Cordia rothii*, *Acacia leucophlœa*, with *Acacia arabica* in the kind of spots already indicated, and *Sterculia urens* on the less barren hills. *Anogeissus pendula* and *Dichrostachys cinerea* occur but sparingly and hardly ever exceed the dimensions of under-shrubs. Towards the Sinde desert, the only tree to be found wild is said to be *Acacia rupestris*, a form almost totally absent from the eastern tract.

By far the handsomest shrub indigenous to this part of Rajputana is *Tecoma undulata*, which has the double merit of bearing large orange-coloured bell-shaped blossoms, and of bearing them simultaneously with its handsome shining leaves. This plant is so indifferent to climatic conditions that, although naturally found on some of the drier ridges of Marwar, it thrives excellently in gardens in the steamy climate of Calcutta—a peculiarity which it shares with *Dichrostachys cinerea* and *Acacia leucophlœa*. Next to *Tecoma undulata*, the finest indigenous shrub is *Acacia jacquemonti*, the polished stems and thorns and sweet-scented yellow flowers of which make it an object of much beauty and interest. In addition to these, the shrubby vegetation is composed of the following species already mentioned as occurring more abundantly in the eastern tract:—*Capparis aphylla* and *spinosa*; *Helicteres isora*; *Grewia populifolia*, *pilosa*, *villosa*, and *salvifolia*; the two *Zizyphi* (*nummularia* and *xylosyra*), *Cassia auriculata*, *Clerodendron phlomoides*, and *Vitex negundo*. The tamarisks already mentioned are found abundantly in the salt-impregnated bed of the Loni, and two other species of the same family (*Tamarix articulata* and *Myricaria germanica*) also begin to be found. Both these are common in Afghanistan and in Western Asia generally; while the second of the two extends also to high altitudes both in the Himalayas and in some of the mountain

ranges of Northern Europe. *Balanites Roxburghii* (a prickly scraggy shrub common in Southern India, Central Provinces and other dry parts of India) is here pretty common. *Balsamodendron mukul*, a shrub which yields a gum called *mukul* or *gugal*, and which extends to the dry countries far to the westward of India, begins here to be as abundant, as east of the Arvalis it is rare. *Ephedra alte*, a bush common in the west of Asia and north of Africa, is said to have been found in Jesulmer. The pretty little camel-thorn (*Alhagi maurorum*) which, occurring in the eastern tract and far beyond it in India, is also distributed in Southern Europe and Western Asia, here forms a prominent feature in the vegetation of the sandy tracts. Associated with it are a few other bushes, such as *Calotropis procera* and *Ortanthura viminea* (both of which yield an excellent fibre), and here and there *Periploca aphylla*.

Of the herbaceous vegetation, the prominent species may be indicated as follows: *Peganum harmala* (a rutaceous plant, which is found in the Deccan and Punjab, and which is distributed to the westward along the Mediterranean coasts as far as the Atlantic) occurs in plenty in many spots, as, for example, near Palli. *Polygala abyssinica* is not unfrequent in places. The most abundant leguminous plants are *Crotalaria burhia* (much valued for fodder) and *Tephrosia purpurea*. *Compositæ* are represented by one or two *Blumeas*, *Vernonia cinerea*, *Microhynchus nudicaulis*, and *Berthelotia lanceolata*; here and there *Tricholepis radicans* and *Echinops echinatus* are to be seen; and near irrigated spots may be met with *Machlis hemispherica*, *Sphæranthus hirtus*, and *Cyathocline lyrata*. Not uncommon in gardens as weeds of cultivation are *Saponaria baccaria*, *Trianthema crystallina*, *Asphodelus fistulosus*, and *Fumaria parviflora*. Of acanthaceous plants, the most frequent are *Lepidagathis trinervis* and *Barleria noctiflora*, with here and there two plants of wide distribution in India,—namely, *Justicia procumbens* and *Peristrophe bicalyculata*. *Boraginæ* are numerous in individuals belonging to the genera *Eritrichium* and *Arnebia*; *Trichodesmus indica* and *Tournefortia subulata* are common near Jodhpur. Several *Cleomes*, one or two *Farsetias*, two or three species of *Abutilon* and *Sida* are also common. *Tribulus terrestris*, *Corchorus depressus*, *Verbena officinalis*, *Lippia nodiflora*, *Bergia æstirosa*, *Cressa cretica*, *Convolvulus arvensis*, *Evolvulus pilosus*, *Withania somnifera*, *Solanum xanthocarpum* var. *Jacquinii*, *Salvia brachiata*, *Polygonum Roxburghii*, and *Aristolochia bracteata* are found in spots where there is a little admixture of vegetable mould, and by the margins of tanks and irrigated spots. *Amarantaceæ* are represented by *Achyranthes aspera*, *Alternanthera sessilis*, *Ama-*

ranthus lividus, *Aerua lanata*, and *Pupalia velutina*. Such *Chenopods* as *Anabasis*, *Atriplex* and *Salsola* abound where, as towards the mouth of the Loni, the sand is highly saline. Parasitic on the roots of *Calotropis* is a pretty species of *Orobanche*. The tanks are not destitute of vegetation, for in their water may be found, though sparingly, *Vallisneria spiralis*, *Utricularia stellaris*, *Potamogeton pectinatus* and *Natans*, while by their margins several species of sedges, and notably *Hymenochaete grossa*, are often abundant. Several species of *Andropogon*, *Anthisteria*, *Cenchrus*, and other wiry grasses are distributed over the whole area; and towards the Sind frontier one of these, known locally as *mart*, constitutes a large proportion of the scanty vegetation. Besides this grass, the vegetation on that frontier consists almost exclusively of the small acacia tree already mentioned (*Acacia rupestris*), of a plant of the rhubarb family with curious hairy seed-vessels known locally as *phog* and botanically as *Calligonum polygonoides*, the woolly-looking plant *Aerua lanata* (locally called *bhin*), *Anabasis multiflora*, and a troublesome bur grass, *Cenchrus biflorus*.

In the sandier parts of this western tract the staff of life is derived from a rain crop of millet, which is sown as soon as a shower in July or August makes it worth while to give a hurried ploughing to the patches of soil which the inhabitants are pleased to call fields. Wheat is a garden crop confined to the small patches which it is possible to irrigate from wells. In the sands of Bikanir, water-melons occur spontaneously in such numbers as to form for some months in the year no small part of the food of the scanty population. The seeds of these and of other cucurbitaceous plants cultivated in gardens are ground, during times of scarcity, into a kind of flour.

From the preceding sketch it may readily be inferred that the country is barren and infertile, and it is difficult for one who has not visited it to realise that in spite of its many natural drawbacks, it affords sustenance to a human population of exceptionally fine physique, and is the breeding ground of some of the finest races of cattle and horses and of the best camels in India. The bullocks of Nagore are celebrated for their size and paces; the endurance of the horses of Malláni is proverbial; while the swiftest riding-camels in India are born and bred in Bikanir. It is perfectly wonderful to see the apparently bare barren plains from which these animals contrive to pick up their daily food.

Nothing has hitherto been said of the cryptogamic vegetation of Rajputana. As might be expected, the richest spot in this respect is Aboo; but even there only about a dozen species of ferns occur, and of this small number only *Adiantum caudatum*,

Adiantum lunulatum, *Cheilanthes farinosa*, *Nephrodium molle*, *Nephrodium cicutarium*, and *Actiniopteris radiata* can be said to be abundant. *Adiantum capillus-Veneris* is found in a few spots, and *Botrychium virginianum* is very rare. Of mosses there are a few which, during the rains, form pretty tufts and festoons on the branches of the trees on the south-western slopes of the mountain, but at other times they are shrivelled and brown. There are a good many lichens on the trees and a few on the rocks. *Algae* are not numerous. During the rains a good many *fungi* spring up on decaying wood, and an edible *Agaricus* is found on grassy banks; *leaf fungi* are few in number.

In the eastern tract, the only ferns ever seen are *Adiantum lunulatum* and *caudatum*, *Nephrodium molle*, and *Actiniopteris radiata*. The latter is found only on walls, where it is associated with *Funaria hygrometrica*, the only moss at all common in the region. These species occur very sparingly indeed in the western tract, and only in shady crevices of rocks or on old moist walls. In wells, the maiden hair, *Adiantum capillus-Veneris*, is occasionally met with on both sides of the Arvalis.

As has already been remarked, the province of Rajputana does not possess a flora peculiar to itself, but rather presents a field on which the adjacent floras of dry India and of the deserts of Western Asia and Northern Africa interosculate. In other words, there are, so far as the writer is aware, no species peculiar to this area, every plant in it being found also either in the adjacent provinces of Central India, Guzerat, the Punjab, North-Western Provinces, or in the dry regions of the Deccan and Southern India; while several of them occur also in countries far beyond the limits of the Indian Empire.

SECTION V.

PART I.—RIVERS AND WATER STORAGE.

In the north-west division of Rajputana the only river of any consequence is the Loni, which rises in the Pokar Valley close to Ajmer, and runs south-west for about 200 miles into the Rann of Kutch. It receives and cuts off from the western plains all the drainage brought by the mountain torrents down the western slopes of the highest part of the Arvalis between Ajmer and Aboo; it runs for the most part through a sandy channel between low banks; its waters are brackish, and the bed occasionally yields salt; hence its name, meaning the salt river. When very heavy rains fall, the Loni overflows its banks to a breadth of

some five miles, leaving as it recedes a rich alluvium which gives excellent crops.

North-west of the Loni, Rajputana is entirely destitute of perennial streams. A small stream rises in the north of Jaipur, but, after flowing northward for some distance, is lost in the sands of the Shekhawati country. And throughout all the north-east of Rajputana there are no perennial rivers worth mention; nor does any water penetrate from this region eastward into the Jumna water system, until we turn as far south as the Bángunga River which runs out through Bhartpur. The high watershed of the midland country about Ajmer and Jaipur sends all its appreciable contributions of water southward into the Banás.

In the south-eastern division of Rajputana the river system is important. The Chambal is by far the largest river in Rajputana, flowing through the province for about one-third of its course, and forming its boundary for another third. It rises upwards of 2,000 feet above the sea near the summits of the Vindhya, and runs in a northern direction over a basaltic bed in Malwa till it enters Rajputana at Chaurásgarh on the south-east border of Meywar. At this point the old fort of Chaurásgarh stands 300 feet above the stream, and the stream level is 1,166 feet above the sea, the width of the bed being 1,000 yards. Here it breaks through a scarp of the Patár plateau, and runs between precipices in a straight line for three miles, the water falling over a succession of rapids. The country above slopes downward and closes up steadily upon the river's channel, the bed getting narrower and narrower until the rocky banks at the water's edge entirely disappear, leaving nothing but the scarps on either side, the water lying in a long deep pool filling up the whole valley. From ridge to ridge the valley here is only 350 yards in width. For ten miles from Chaurásgarh the river flows in this sort of *cañon*, until it emerges in the Gunjali Valley and avoids an interposing scarp by flowing round the flank of it; whence, continuing in a northerly direction below this range, with a small strip of soil under the cliffs, it meets the Bámni River at Bhainsrorgarh. The water level here is 1,009 feet above the sea, giving a fall of 157 feet in 30 miles from Chaurásgarh, or nearly 5 feet per mile. A little more than three miles before it reaches this place, the whole river falls down a succession of small cataracts into a cleft in the rocks, the total fall being about 80 feet; in one place there is a clear drop of 20 to 30 feet. This place is well known locally by the name of "Chulis."

From Bhainsrorgarh it flows north-east till after about five miles it meets a third and northernmost barrier of hill, which it cuts right through, and pushes on in a north-east course to Kota

city. In its course through Kota it collects the water of several large streams flowing northward from the skirts of the Vindhya, and so much of the drainage of the Meywar plateau as is not intercepted by the Banás. Near the town of Kota the Chambal is a broad sluggish stream, very blue in colour, flowing between magnificent overhanging cliffs and rocks rising sheer out of the water, covered with trees and thick brushwood famous as tiger preserves. Beyond Kota the hills no longer press on and harass the river's march, and its course to the north-east is comparatively unopposed. Further northward it receives its two principal tributaries, the Párbati from the right and the Banás from the left, and flows under an irregular lofty wall of rock on its left bank along the whole length of the Karauli State, until it emerges into the open country near Dholpur, and finally discharges itself into the Jumna. The total length of the Chambal is about 560 miles.

Next in importance to the Chambal ranks the Banás, which rises in the south-west near Kankraoli, in Meywar, about three miles from the old fortress of Kumalgarh, and flows southward until it meets the Gogunda plateau, when it suddenly turns eastward, cutting through the outlying ridges of the Arvalis. Further on it settles decidedly down into a north-easterly line, and flows right across Northern Meywar, collecting all the drainage of the Meywar plateau, with the watershed from the south-eastern slopes and hill tracts of the Arvalis. Its chief affluents are, in Meywar, the Berach and the Kotesari from the Arvalis, and the Dhund from the Jaipur country. In its northerly section the river is for some distance foiled in its attempt to effect a junction with the Chambal by the steppes of the Patár plateau, and it has to make a curious détour along this high ground, searching vainly for a passage, until it has quite rounded the obstacle. There is some fine scenery where it strikes through the small picturesque group of hills at Rájmahal, and here the waters of the Banás are remarkably clear and pure; but though the bed of its upper course is hard and rocky, it abounds in dangerous quicksands lower down. It joins the Chambal a little beyond the north-east extremity of the Búndi State, after a course of about 300 miles.

Among the south-western hills of Meywar, the Western Banás and the Sabarmati take their rise, but reach no size or importance until after passing the Rajputana frontier toward the south-west. The Máhi, a considerable river in Guzerat, runs for some distance among the territories of Pertábgarh and Bānswára, but it neither begins nor ends within Rajputana. One of its principal tributaries in this part of it is the Som, which flows first east

and then southward through Meywar. These rivers carry off the drainage of the south-west corner of Rajputana into the Gulfs of Kutch and Cambay.

PART II.—LAKES.

There are no natural fresh-water lakes in Rajputana, the only considerable basin being the well-known salt lake at Sámbar.

About 40 miles north-west of Ajmer occurs a depression within the lines of the hills which mark the general north-westward run of the Arvali range as it begins to lose continuity and to subside. The land all round slopes towards the hollow of this depression, which thus forms a great basin with no outlet, containing a shallow sheet of water which spreads or contracts according to the season. This is the Sámbar Lake, so called from the town on its banks; it lies in latitude $26^{\circ} 58'$, and longitude $75^{\circ} 5'$; its eastern shore is distant 36 miles from Jeypur; its western shore 130 miles from Jodhpur. In the height of the rains the water extends to a length of 18 or 20 miles, with breadth varying from 10 to 3 miles; in very hot and dry summers the wet bed is little more than a mile in length and less than half a mile across. The lake's longest stretch is nearly east and west, and the deeper portion, which never dries up, and which is locally called "the treasury," is situated near the centre of the lake, almost opposite a bold rocky promontary (Máta-ki-devi) which juts out from the southern shore. In the dry season the view of the lake is very striking. Standing on the low sandy ridges which confine the basin on the south, one may see what looks to be a great sheet of snow, with pools of water here and there, and a network of narrow paths marking the near side of it. What appears to be frozen snow is a white crisp efflorescence of salt, while beyond the white flats toward the middle of the lake the salt crust is gathered from beds out of which the water is evaporated. The salt is both held in solution in the water of the lake, and also pervades in minute crystals the whole substance of black mud that forms so large a part of the lake's bed.

This most valuable possession has often been fiercely contested. The lake was worked by the Imperial administration of Akbar and his successors up to Ahmed Shah, when it fell back into the hands of the Rajput Chiefs of Jaipur and Jodhpur. The eastern shore, and part of the southern shore, is now the joint possession of Jodhpur and Jaipur; the rest belongs to Jaipur.

The finest artificial lakes are within the territory of the Oodipur State, among the low hills of the Meywar plateau. The lakes near

Debar and Kankraoli are the largest of all; the former is a noble sheet of water lying about 20 miles south-east of Oodipur town. It is formed by a dam across a perennial stream where it runs through a gap in the hills, which was built A. D. 1681 by the Rána Jai Singh, from whom it is named *Jai Samand*. The length of this lake is about 8 to 10 miles east and west, and averages about a mile in breadth, and cannot be under 25 or 30 miles in circumference. The elevation of the lake is about 960 feet above the sea. On the south the hills rise 1,000 feet above the level of the water, while the northern shore is studded with pretty little hamlets, mostly peopled by fishermen. Small forest-covered islands crop up in the midst of this vast sheet of water, adding greatly to the beauty of, perhaps, one of the largest artificial lakes in the world. The dyke is entirely made of massive stones forming steps to the water's edge. The Kankraoli Lake is distant about 52 miles north of Oodipur upon an outlying southern skirt of the Arvalis, and the catchment is formed by a long sweeping embankment resting one wing upon some hills and thrown in crescent shape across the slope of the country for nearly 3 miles; the area under water after a good rainy season is about 12 miles round. One part of the embankment between the hills is faced with white marble surmounted with handsome pavilions of the same stone, and upon another stands a very famous shrine belonging to the worship of Krishna, with extensive buildings, and the town of Kankraoli beneath it. The embankment was constructed in A. D. 1661 by the Rána Ráj Singh to employ his starving subjects during a famine, and the Rána's fortified palace on a hill just over the lake is very picturesque.

There is also a fine lake a few miles from Oodipur called the Oodiságar, containing a sheet of water very deep in parts, and about 12 miles round at its best; the water is held up by a lofty dam of massive stone blocks thrown across a narrow outlet between two hills; the circumference must be from 10 to 12 miles. At Oodipur itself there is a very beautiful and extensive piece of water called the Pechola Lake, formed by stone dykes raised on either side of a low rocky ridge, so that the water runs right along one side of the town, which has been built upon or behind the dam. On the highest point of the natural containing-ridge stands the Rána's palace, one of the most striking edifices in the country. The view across the expanse of water to the dark background of woody hills, which close in round the western sides and supply the waters which fill the lakes, is as fine as anything in India.

Other smaller lakes or tanks are to be found in the Meywar country. There is a fine basin among the hills which surround

Ajmer, lying close over against the city, having a stone embankment supporting the marble palaces of the Moghal Emperors. But, owing to the uncertain rainfall of Central Rajputana, the breadth under water varies considerably from year to year. In the eastern States, about Búndi and Kota, there are some broad and shallow sheets of water pent up among low hills, which do not, except in very bad seasons, wholly dry up within the year. All these artificial lakes have been built with the object of storing water, without looking to its subsequent distribution. The area which they can irrigate for cultivation is therefore very insignificant, and lies mainly within the lake's bed, which yields excellent crops as the water subsides, if it subsides in time. In the British district of Ajmer some large reservoirs have recently been constructed for the purpose of irrigation, but their success is altogether dependent upon the precarious local rainfall.

SECTION VI.—HISTORY.

Rajputana.—The faint outlines which can be traced of the condition of the country now called Rajputana, for one or two centuries before the Mahomedans invaded Upper India, indicate that it was subject, for the most part, to two or three very powerful tribal dynasties. Of these, the dynasty of the Rathor family, which ruled at Kanoj, appears to have had the widest dominion; for the early Arabian geographers make the frontier of Kanoj conterminous with Sindé, and Almarudi styles the Kanoj monarch one of the kings of Sindé. However this may be, it seems certain that the Kanoj territory extended far westward beyond the Jumna into Rajputana; while much of the south-western part was included within the limits of another great kingdom which had its capital in Guzerat.* Other tribal dynasties succeeded; and in the eleventh century, about the period of the first Mahomedan inroad into the interior of Northern India, the leading tribes were the Solankhies of Anhulwarra in Guzerat, the Chohans at Ajmer, and the Rathors at Kanoj. The Gehlot clan had established itself in the Meywar country, which is still held by the Sesodias, a sept of the Gehlots. The Rahtors and Sodas held the north-western deserts where they are still dwelling; and the Kachwáha clan had occupied the eastern tracts about Jaipur, now their Chief's capital.

* It would appear from some inscriptions which Professor Bühler has recently obtained from Kan, near the Gulf of Cambay, that somewhere about the ninth century, A. D., the Rathors held some districts as far south-west as the northern bank of the Taptec.

The desert which lies between Sinde and Rajputana appears to have sheltered the tribes from any serious inroads of the Arabs who reigned in Sinde, but from the north-west their territory was more exposed. Thus the first Musalman invasions found Rajput dynasties seated in all the chief cities of the north, and ruling large territories throughout the rich Gangetic plains—at Lahore, Delhi, Kanoj, and Ajodhya. Mahomed of Ghazni marched to Kanoj in 1017 A. D., and reached Muttra; a few years later he subdued Lahore, and in 1024 he made his celebrated expedition to Somnath in Guzerat, marching from Muttra across the Rajput countries to Ajmer. The Solankhies of Anhilwarra were overcome; but the Rajputs barred Mahomed's return by Ajmer, and he was forced to find his way back through the Sinde deserts.

In 1170, a furious war broke out between the Solankhies of Anhilwarra and the Chohans of Ajmer, in which the former were defeated; and about the same time began the famous feud between the Chohans and the Rathors of Kanoj, the cause of which is ascribed by Tod in his romantic style to the abduction of a princess. These dissensions weakened the dynasties; nevertheless, when Shaháb-ud-dín began his invasions, the Chohans fought hard before they were driven out of Delhi and Ajmer in 1193 A. D. Next year Kanoj was taken, and the Rathor princes, utterly broken in the Gangetic Doab, emigrated to the country which they have since ruled in North-Western Rajputana. But Ajmer was still sharply disputed, though Kutb-ud-dín, Shaháb-ud-dín's Governor in India, managed at last to drive back the tribes united to contest his occupation of the middle countries, and to force his way through them again into Guzerat. Ajmer and Anhilwarra, the former Rajput capitals, were garrisoned by his troops; and the Musalmans appear gradually to have overawed, if they did not entirely reduce, the open country between and about these two places, having garrisoned the fortresses and secured the natural outlets of Rajputana toward Guzerat on the south-west, and the Jumna on the north-east. The effect was probably to press back the clans more into the outlying districts, where a more difficult and less inviting country afforded a second line of defence against the foreigner—a line which they have held successfully up to the present day. The existing capitals of the modern States indicate the positions to which the earlier Chiefs retreated. One clan (the Bháttis) had before this founded Jesulmer in the extreme north-west, having been driven across the Sutlej by the Ghaznavi conquerors. The Rathors settled down among the sands of Marwar; the Sesodias pushed inward from north-east and south-west, concentrating on the Meywar plateau behind the scarps of the Arvalis; while

the Jádons were protected by the hills and ravines that lie along the Chambal. From these and other migrations and settlements grew up gradually, with varying features and constantly shifting territory, the States now governed by Rajput Chiefs ; the non-Rajput States being of a very different and much more recent formation. The larger States represent the acquisitions of the more powerful and predominant clans ; the smaller States are either the separate conquests of a sept that parted company from the main clan, or the appanage of some Chief who set up independently. They have all, in fact, a very similar origin. When the dominant families of a clan lost their dominion in the fertile regions of the north-west, one part of the clan seems to have remained in the conquered country ; while another part, probably the defeated Chief's kinsmen and followers, went off westward and carved out another, though much poorer, dominion. They were gradually hemmed up into parts of the country productive enough to yield food or rents, and defensible against the great armies of the foreigner. Having then made a settlement and built a city of refuge, each clan started on an interminable course of feuds and forays, striving to enlarge its borders at the cost of its neighbour. When the land grew too strait for the support of the Chief's family, or of the increased clan, a band would assemble under some new leader and go forth to plant itself elsewhere. In this way the whole of Rajputana appears to have been parted off among the clans which we find there now, and the territories that have been gradually rounded off and consolidated by incessant friction are now called States, under the rule of the Chief of the clan dominant. Of course the original type of tribal dominion has been modified ; towns have grown up round the ancient forts, and the Chiefs have, in some instances, modernised their status towards the likeness of a territorial king. Nevertheless, on the whole, these States are still essentially the possessions of clans, and, as such, can be defined and distinguished territorially ; nor is the political nature or tenure of these States properly intelligible without bearing their origin in mind.

Setting aside, then, for the present, the two Ját States and the Mahomedan principality of Tonk, we may describe Rajputana as the region within which the pure-blooded Rajput clans have maintained their independence under their own chieftains, and have kept together their primitive societies ever since their principal dynasties in Northern India were cast down and swept away by the Musalman irruptions.

This, then, being the origin and present constitution of the Rajput States, we have now to give a very condensed sketch of their political history. We have seen how the principal clans,

had been, and there was incessant war throughout the fifteenth century between them and the clans; between the Guzerat king and the Sesodias of Mleywar a constant struggle for territory went on. Aboo was occupied; Chitor twice besieged; Kurnalmer, a strong hill fort of the Sesodias, was attacked, and seems to have been taken and re-taken; Bundi was sacked, and Mahomed Ghilzi of Malwa is recorded by Rerishita to have marched up to Ajmer, then in the hands of the Rajputs, and to have taken the fort by storm in 1454 A. D. Thenceforward Ajmer was held for about fifty years by the rulers of Malwa, and several plundering excursions were made into Marwar. Some of the most fertile tracts belonging to the Rajputs in the south and south-west were gradually lost to them and annexed to Malwa or to Guzerat. They were expelled from the plain country north-west of Ahmedabad by the Guzerat king; while the Malwa king took from the Chohans of Eastern Rajputana a great part of their southern lands, and for some time occupied both Chanderi and Rinthanbor. On the other hand, the fifteenth century was a period of disruption for the Delhi Empire, which, after Tamerlane had crushed the Toghlaq dynasty, had practically broken up into a number of semi-independent principalities, under the leaders of different Afghan tribes. This state of things enabled the Rajputs to regain some ground toward the east, until Sultan Sikander Lodi united again under one rule the Afghan confederation, and forced all the neighbouring Hindu princes to acknowledge his supremacy. From the end of the fifteenth century the permanent territory of the independent clans was confined within those natural barriers formed by the difficult country which still more or less marks off their possessions in Central India; though in several parts, and especially about Gwalior, the Maratha usurpations have overlaid the ancient

At the beginning of the sixteenth century, indeed, the last Afghan dynasty that reigned at Delhi was breaking up in the usual high tide of rebellion; and as Malwa and Guzerat were at war with each other, the time was favourable for a Rajput revival. For one short interval of this century the talents and valour of the famous Rana Sanga of Odipur, the Chief of the Sesodia clan in Mleywar, once more enlarged the borders of the Rajputs, and attained for them something like predominance in Central India. This Chief, the single example of great political ability among the Rajputs, aided by Medini Rao, Chief of Chanderi, fought with great success against both Malwa and Guzerat. Medini Rao had acquired supreme authority in Malwa under Mahomed II, who at last, finding that the Rajputs were supplanting

the Mahomedan power in the country, called in the king of Guzerat, and the two Musalman kings re-took Mandu near Gagron, a strong fort now in the Jhalawar State, he received a bloody defeat from Rana Sanga and his Rajput cavalry, and was himself captured in 1519. In 1526 the Rana allied himself with Guzerat for the total subjugation of Malwa, when he annexed to his own dominion all the fine eastern provinces of that kingdom, and recovered the strong places of the Eastern Marches.

The power of the Rajputs was now at its zenith. Rana Sanga was no longer the chief of a clan, but the king of a country; he had the hegemony of all the clans, and could command their contingents. But in the year when Malwa was subdued, and one month before its capital surrendered, the Emperor Baber took Delhi and extinguished the Afghan dynasty, so that Rana Sanga had only just beat down his ancient enemy in the south, when a new and greater danger threatened him from the north. The Rana marched up towards Biana, which he took from a garrison placed there by Baber, having been joined by Hasan Khan, the powerful Chief of the Mewatti country, which now belongs principally to the Uwar State; and Baber pushed down to meet him. At Fatehpur Sikhr, in the year 1527, the Rana at the head of all the chivalry of the clans encountered Baber's army, and was defeated after a furious conflict, in which fell Hasan Khan Mewatti and many Rajput Chiefs of note. The conjuncture of affairs which this battle solved resembles in some ways the crisis decided nearly 250 years later (in 1761) on the plains of Paniput. At both epochs the Hindus of Central and Southern India were advancing under able and ambitious leaders to dispute with the Musalmans the possession of the northern provinces; and each time they were met by an army and a commander fresh from the wars of Central Asia. In both cases the event was the same, though Rana Sanga and his Rajputs put Baber into much greater peril than the Alautas caused to Ahmed Abdali. Nevertheless, the great Hindu confederacy was hopelessly shattered by the defeat at Fatehpur Sikhr. Next year Aladdin Rao, with the flower of his clan, fell in the defence of Chanderi, which was taken by Baber. Rana Sanga died shortly after, covered with wounds and glory; and the short-lived splendour of united Rajasthan waned rapidly. In 1536, Bahadur Shah of Guzerat took Chitor, and recovered from the Rajputs almost all the provinces which Rana Sanga had won from Malwa. The power of the Sesodia clan was much reduced, and its predominance was transferred to the Rathors of the north-west, where

Maldeo Rao of Jodhpur had become the strongest of all the Raj-put Chiefs. The struggle which began soon after Baber's death, between the Emperor Humayun and the Afghan Sher Shah, had relaxed the pressure of the Delhi power upon the clans from this side, and Maldeo had greatly increased in wealth and territory. When Humayun was flying before Sher Shah, Maldeo offered him an asylum, intending to play him off against the growing strength of the Afghan, but changed his mind on discovering Humayun's desperate condition. In 1544 Maldeo was invaded by Sher Shah in great force, but gave him such a bloody reception near Ajmer, that Sher Shah abandoned further advance into the Rathor coun-try, and turned southward through Meywar into Bandelkhand, where he was killed before the fort of Kalinjhar.

It is clear that the victory of Ratehpur Sikhi extinguished the last chance which the Rajputs ever had of regaining their ancient dominions in the rich plains of India. It was fatal to them not only because it broke the war-power of their one able leader, but because it enabled the victor to lay out the foundations of the Moghal Empire. A firmly consolidated empire surrounding Rajasthan necessarily put an end to the expansion, and gradu-ally to the independence, of the clans; and thus the death of Humayun in 1556 marks a decisive era in their history. The Emperor Akbar represented the power of Musalman predomi-nance at its full, wielded by one man of singular administrative and military ability. Immediately after his accession he attacked Maldeo, the Rathor Chief, recovered from him Ajmer and several other important places, and forced him to acknowledge his sov-erignty. The Emperor then undertook to settle all Rajputana systematically. Chitor, the Sesodia citadel in Meywar, was again besieged and taken with the usual grand finale of a sortie and mas-sacre of the defenders. Oodipur was occupied; and though the clan never formally submitted, they were reduced to guerilla warfare in the Arwais. In the east, the Chief of the Kachwaha clan at Amber (the Jaipur Raja's ancestor) had entered the imperial ser-vice, while the Chohans of Bundi and Kota were overawed or conciliated. They surrendered the fort of Rinthanbor, the key to their country, and were brought with the rest within the pale of the empire. Akbar took to wife the daughters of two great Rajput houses; he gave the Chiefs or their brethren high rank in his armies, sent them with their contingents to com-mand upon distant frontiers, and succeeded in enlisting the Raj-puts generally, except only the distant Sesodia clan, not only as tributaries but as adherents. After him Jehangir made Ajmer his head-quarters, whence he intended to march in person against the Sesodias, who had defeated his generals in Meywar; and here at

last he received, in 1616, the submission of the Rana Umrā of Oodipur, who, however, did not present himself in person. But though the Ranas of Oodipur never attended the Moghal Court, they sent henceforward their regular contingent to the imperial army, and the ties of political association were henceforward drawn closer in several ways. The Chiefs constantly entered the imperial service as governors and generals (there were at one time forty-seven Rajput mounted contingents), and the headlong charges of their cavalry became famous in the wars of the empire. The Emperors Shah Jehān and Jehāngir were both sons of Rajput mothers; and Shah Jehān in exile had been protected at Oodipur up to the day of his accession. Their kinship with the clans helped these two emperors greatly in their contests for the throne; while the stream of Hindu blood softened their fanaticism and mitigated their foreign contempt for the natives of India. When Shah Jehān grew old and feeble, the Rajput Chiefs took their full share in the war among his sons for the throne, siding mostly with Dara, their kinsman by the mother's side. At Ujjen, Raja Deswan Singh of Marwar was defeated with great slaughter in attempting to stop Arunngzeb's march upon Agra; and again at the growing victory over Dara at Agra the Rajputs distinguished themselves on the losing side, though they were at last induced to abandon the unfortunate Dara, whose ruin was completed by deserting Singh's desertion of him at the battle near Ajmer. Arunngzeb employed the Rajputs in distant wars, and their contingents did duty at his capital. But he was a bigoted Islamicite; and although one Rajput Chief governed Kabul for him, while another commanded his army in the Dakhan, he is said to have had them both poisoned. Towards the latter end of his reign, he made bitter, though unsuccessful, war upon the Sesodias, and devastated parts of Rajputana, but he was very roughly handled by the united Rathors and Sesodias, and he had thoroughly alienated the clans before he died.

Thus, whereas up to the reign of Akbar the Rajput clans had maintained their political freedom, though within territorial limits that were always changing—from the end of the sixteenth century we may regard their Chiefs as having become feudatories or tributaries of the empire, which was their natural and honourable relation to the paramount power in India. The *Lit-i-Mushir*, which professes to contain a survey or record of all the possessions and dependencies of the Moghal Empire in 1600, parcelled out into twelve grand divisions called *Sibakhs*, includes in *Sibakh Ajmer* the whole of Central Rajputana, except a few outlying tracts which fall into other divisions, while Southern Rajputana is brought within the Akbar and Gujarat *Sibakhs*. This record sets

zeb's death—was occupied by four long and strong reigns, and for a century and a half the Moghal was fairly India's master. Then came the ruinous crash of an overgrown centralised empire, whose spoils were fought over by Afghans, Sikhs, Jāts, revolted viceroys, and rebellious military adventurers at large. The two Syuds governed the empire under the name of Ferokhsir; Jodhpur was invaded and the Rathor Chief was forced to give a daughter to the Emperor. He leagued with the Syuds until they were murdered, when in the tumult that followed he seized Ajmer (1720). In the quarrels for chieftainship which followed, one of the Rathor claimants called in the Marathas, who got possession of Ajmer about 1756 A. D., and thenceforward Rajputana became involved in the general disorganisation of India. Even the Rajput chieftainships, the only ancient political groups left in India, were threatened with imminent obliteration. Their primitive constitution rendered them quite unfit to resist the professional armies of Marathas and Pathans, and their tribal system was giving way, or at best transforming itself into a disjointed military feudalism. About this period a successful leader of the Jāt tribe, which cultivates some of the best lands on the right bank of the Jumna, took advantage of the dissolution of the imperial government to seize territories and to set up a dominion. He was acute enough to foresee the defeat of the Marathas in 1761, and to abandon them on the eve of the great battle of Paniput. He built fortresses and annexed districts, partly from the empire and partly from his Rajput neighbours; and his acquisitions were consolidated under his successors until they developed into the present Bhartpur State.

The Rajput States very nearly went down with the sinking empire. One faction in Meywar committed, about 1768, the fatal folly of calling in Marathas to aid them; another faction in Marwar did the same thing, and thenceforward Rajputana was gradually overrun and dilapidated. The utter weakness of some of the Chiefs, and the general disorder following the disappearance of a paramount authority in India, dislocated the tribal sovereignties and encouraged the building of strongholds against predatory bands, the rallying of parties round petty leaders, and all the general symptoms of civil confusion. From lismemberment among rival adventurers the States were rescued by the appearance of the English on the political stage of Northern India. In 1803 all Rajputana, except the farther States of the north-west, had been virtually brought under by the Marathas, who exacted tribute, ransomed cities, annexed territory, and extorted subsidies. Sindia and Holkar were deliberately exhausting the country, lacerating it by ravages, or bleeding it scientifically by relentless tax-gatherers; while the lands had

been desolated by thirty years' incessant war. Under this treatment the whole group of ancient chieftainships was verging towards collapse, when Lord Wellesley struck in for the English interest. The victories of Generals Wellesley and Lake permanently crippled Sindia's power in Northern India, and forced him to loosen his hold on the Rajput States in the north-east, with whom the English made a treaty of alliance against the Marathas. In 1804 Holkar tried conclusions with those who had beaten Sindia and the Bhonsla; he marched up through the heart of Rajputana, attempted the fort of Ajmer, and threatened our ally, the Raja of Jaipur. Colonel Monson went against him, and was enticed to follow Holkar's sudden retreat southward beyond Kota, when the Marathas suddenly turned on the English commander and hunted him right back to Agra. Then Holkar was, in his turn, driven off by Lord Lake, who smote him blow on blow, but Lake himself failed signally in the dash which he made against the fortress of Bhartpur, where Holkar had taken refuge under protection of the Ját Chief, who broke his treaty with the English and openly succoured their enemy. The fort was afterwards surrendered; Holkar was pursued across the Sutlej, and in 1805 signed a treaty which stripped him of some of his annexations in Rajputana. Upon Lord Wellesley's departure from India our policy changed; we drew back from what seemed to Lord Cornwallis and Sir George Barlow a dangerous net-work of new ties and responsibilities, and we attempted to contract the sphere of British connections; that is, we left all the Central India and Rajput Chiefs to take care of themselves. The alliance with Jaipur being formally dissolved, that State was abandoned to Holkar, who pillaged it mercilessly, and the strong fortress of Gwalior, which, with its surrounding districts, had been wrested by Lord Wellesley from Sindia (who had taken it from the family which now rules at Dholpur), was again restored to the Maratha. The consequence was that the great predatory leaders in Central India plundered at their ease the petty States we had abandoned to them, and became seriously arrogant and aggressive towards ourselves. This attitude on our part of masterly inactivity lasted ten years, and Rajputana was being desolated during the interval; the roving bands increased and multiplied all over the middle countries into Pindaree hordes, until in 1814 Ameer Khan was living at free quarters in the heart of the Rajput States, with a compact army estimated at 30,000 horse and foot and a strong artillery. He had seized some of the finest districts in the eastern States, and he governed with no better civil institutions than a marauding and mutinous force. The two principal Rajput chieftainships of Jodhpur and Jaipur had brought themselves to

the verge of extinction by the famous feud between the two rulers for the hand of the princess Kishen Konwr of Oodipur; while the plundering Marathas and Pathans encouraged and strenuously aided the two Chiefs to ruin each other, until the dispute was compromised upon the basis of poisoning the girl.

Sir Charles Metcalfe, Resident at Delhi, reported in 1811 that the minor Chiefs urgently pressed for British interposition, on the ground that they had a right to the protection of the paramount power, whose obvious business it was to maintain order. He found it difficult to obtain from them an admission that the policy of total abstention by a government occupying the paramount place, was ever just, and he strenuously recommended a confederation of the Rajput States under British protection. No forward steps were, however, taken until, in 1816, Ameer Khan with his Pathans invested the capital of Jaipur, when the Chief applied for and obtained English intervention, and the siege was raised; but the Jaipur State hesitated to conclude a permanent alliance. In 1817 the Marquis of Hastings was at last enabled to carry into action his plan for breaking up the Pindaree camps, extinguishing the predatory system, and making political arrangements that should effectually prevent its revival. Lawless banditti were to be put down; the general scramble for territory was to be ended by recognising lawful governments once for all and fixing their possessions, and by according to each recognised State British protection and territorial guarantee, upon conditions of acknowledging our right of arbitration and general supremacy in external disputes and political relations. Upon this basis overtures for negotiation were made to all the Rajput States; and in 1817 the British armies took the field against the Pindarees. Ameer Khan disbanded his troops and signed a treaty, which confirmed him in possession of certain districts held in grant, and by which he gave up other lands forcibly seized from the Rajputs. His territories, thus marked off and made over, constitute the existing State of Tonk. Of the Rajput States, the first to conclude a treaty was Kota, in December 1817; and by the end of 1818 similar treaties had been executed by the other Rajput States, with clauses settling the payment of Maratha tributes and other financial charges. There was a great restoration of plundered districts and rectification of boundaries. Sindia gave up the district of Ajmer to the British, and the pressure of the great Maratha powers upon Rajputana was permanently withdrawn.

From the year 1818 the political history of Rajputana has been comparatively uneventful. The State of Bhadpur lies within the circle of political administration, but is otherwise of

a different origin and nature from the Rajput States proper. It had not entered into the treaties of 1818. In 1825 a serious dispute over the succession to the chiefship caused great political excitement, not only within Bhartpur, but among the surrounding States, some of which were secretly taking sides in the quarrel which threatened to spread into war. Accordingly, with the object of preserving the public peace, the British Government determined to displace an usurper and to maintain the rightful Chief; and Bhartpur was stormed by the British troops on the 18th January 1826. In 1835 the prolonged misgovernment of Jaipur culminated in serious disturbances, which the British Government had to compose; and in 1839 a force marched to Jodhpur to put down and conciliate the disputes between the Chief and his nobles which disordered the country.

The State of Kota had been saved from ruin and raised to prosperity by Zálím Singh, who, though nominally minister, really ruled the country for more than forty years; and the treaty of 1817 had vested the administration of the State in Zálím Singh and his descendants. But this arrangement naturally led to quarrels between Zálím Singh's heirs and the heirs of the titular Chief, wherefore in 1838 a part of the Kota territory was marked off as a separate State, under the name of Jhálawar, for the descendants of Zálím Singh, who was a Rajput of the Jhála clan.

Ajmer-Merwarra.—The district of Ajmer-Merwarra must be noticed separately. It lies, as has been already mentioned, in the centre of the Rajput country, surrounded on all sides by the territories of the Chiefs. The plateau on which stands the town of Ajmer is, perhaps, the highest elevation of the plains of Hindustan, and the fort of Táragarh, which overlooks the town, is 2,855 feet above sea-level, and more than 1,300 feet above the plateau. From its situation and from the natural strength of its fortress, Ajmer has always been a remarkable and important place. There are very early traditions of contests among the clans for its possession, and it belonged for some time to the Rajput princes of Delhi. Mahomed of Ghazni reached the city on his way to Sômnáth in 1024 A. D., and in 1193, Shaháb-ud-dín took the fortress with great slaughter. The great importance, as a *point d'appui* in the midst of the country of the clans, of the fort and district of Ajmer, was very early recognised by the Musalmans. It commanded the main routes; it was a centre of trade lying at the foot of an almost impregnable fort; well watered for these arid tracts, in a situation at once strong, central, and most picturesque. The fort was lost and won several times in the Middle Ages; the Rajputs recovered it in 1210, lost it again for nearly two centuries; recovered it in the confusion that followed

Tamerlane's invasion; again lost it to the kings of Malwa about 1469, and re-took it only to yield it up to Akbar, when the Musalmans held possession for about two centuries more. Akbar made Ajmer the head-quarters of a Súbah, which nominally included all the surrounding territories of the clans. His successors in the seventeenth century resided there frequently, and it was at Ajmer that Jehángir received Sir Thomas Roe, the ambassador sent by James I in 1615. Aurungzeb defeated Dára close to the town; and his wars with the Rajputs kept his head-quarters constantly at the place. In the confusion of the eighteenth century, the Rathors of Marwar got hold of the district and fort again for a while, but soon had to yield to Sindia, then in the full tide of his early fortunes. By Sindia the place was ceded, with the lands adjoining, to the British Government in 1818, and thus for six centuries or more, with a few intervals, Ajmer has been the symbol of political predominance in Rajputana, and has contained the garrison by which the masters of Northern India have enforced their jurisdiction over the unruly clans.

The province of Ajmer-Merwarra, as it now stands, consists geographically of two distinct tracts which were, up to recently, separate districts. The Ajmer country is bounded on the north by Kishengarh and Marwar, on the south by Merwarra and Meywar, on the east by Kishengarh and Jaipur, and on the west by Marwar. It lies between north latitude $26^{\circ} 41' 0''$ and $25^{\circ} 41' 0''$, and east longitude $75^{\circ} 27' 0''$ and $74^{\circ} 17' 0''$, and contains, according to the revenue survey of 1847, an area of 2058.28 square miles.

The tract called Merwarra is bounded on the north by Marwar and Ajmer, on the south by Meywar, on the east by Ajmer and Meywar, and on the west by Marwar. It lies between north latitude $26^{\circ} 11' 0''$ and $25^{\circ} 23' 30''$, and east longitude $73^{\circ} 17' 30''$ and $74^{\circ} 30' 0''$, and contains a population of 69,231, with an area, according to the revenue survey, of 602.23 square miles.

The Sanskrit word *meru* (hill) enters into the composition of the names of both tracts; and the predominant feature of the country is the Arvali range, which, running in from the north-east, appears about the town of Ajmer in a parallel succession of hills, the highest being that on which the fort stands. The Nagpahár hill, three miles from Ajmer, is nearly as high. About ten miles from Ajmer, south-westward, the hills subside for a short distance, but near Beáwar they again form up into a compact double range by which the open lands round that place are inclosed. Fourteen miles south of Beáwar the two ranges approach, and near Todgarh they finally meet at a point whence there is a succession of hills and valleys running south-west to the extremity of Merwarra. Merwarra is the hilly tract thus formed

to the south-west of the open district of Ajmer. It is a narrow strip about seventy miles long, inhabited mainly by primitive or mixed tribes, who probably descend from outlaws and fugitives who have from time to time taken to the hills for refuge. They are all styled Mers, but are divided into several clans.

When the mutiny of the Bengal army began in May 1857, there was not a single European soldier in Rajputana. Nasirabád and Nímach were garrisoned by Native troops of the British army, and four local regiments, or contingent forces raised and commanded by British officers, but mainly paid from the revenues of the States, were stationed at Deolee, Beáwar, Brinpura, and Kherwarra. The high tide of mutiny and insurrection swept with its greatest force along the eastern and northern frontier of Rajputana, throughout the Upper Doab between Agra and Delhi, and in parts of the Punjab. The Chiefs of Rajputana were called upon by the Agent to the Governor General (Brigadier-General George Lawrence) to preserve peace within their borders, and to collect their musters; and requisitions were sent to the States bordering on the North-West Provinces for armed aid and support to the British Government. In June the troops of Bhartpur, Jaipur, Jodhpur, and Ulwar were co-operating in the field with the endeavours of the British Government to maintain order in British districts, and to disperse the mutineers. Some 5,000 Jaipur troops marched into the Muttra and Gúrgaun districts. A strong detachment from Jodhpur aided to garrison Ajmer, while the State of Ulwar sent a force to strengthen the Bhartpur corps, which were placed in charge of the country near Agra and Muttra, bordering on their own State. The Karauli and Dholpur Chiefs also exerted themselves to put down local disorders and to keep open the communications. But these levies, however useful as auxiliaries, were not strong enough to take the offensive against the regular regiments of the mutineers. The trained soldiers in the State armies were mostly of the same class and caste with the British sepoy, and sympathised with his revolt; the untrained feudal retainers and clansmen of the Chiefs could not make head alone, and were often, as in the case of the Ulwar Rajputs, treacherously betrayed by the regulars. Moreover, the interior condition of several of the States was critical; their territory, where it bordered upon the country which was the focus of the mutiny, was overrun with disbanded soldiers; the fidelity of their own mercenary armies was very questionable, and their predatory and criminal tribes soon began to harass the country side. When, therefore, the revolt against the British Government reached its height in the Doáb, the frontier chiefs in Rajputana could, for the time, do little more than hold their own, and protect their States against the disorder

and infectious demoralisation produced by the constant passage of mutinied regiments from the interior towards Agra and Delhi. In June 1857 the artillery and infantry had mutinied at Nasirabád, and at Nímach the whole brigade (with very slight exception) had broken out and marched against Agra. The Kota contingent had been called in from Deolee to Agra, where it joined the Nímach mutineers in July. The Jodhpur legion at Erinpura and Aboo broke away in August. The Merwarra battalion and the Meywar Bhíl Corps, recruited for the most part from the indigenous tribes of Mers and Bhíls respectively, were the only native troops in all Rajputana who stood by their British officers. In the very important centre of Ajmer, the head-quarters of British administration and influence in Rajputana, General Lawrence maintained authority by the aid of a detachment of European troops from Deesa, of the Merwarra battalion, and of the Jodhpur allied forces. But throughout the country at large, from the confines of Agra to the confines of Sindh and Guzerat, the States were left to their own resources, and their conduct and attitude were generally very good. In the Jaipur territory tranquillity was preserved. The Bikanir Chief continued to render valuable assistance to British officers in the neighbouring district of the Punjab. The central States kept orderly rule, and their administration was not disorganised. In the western part of Jodhpur some trouble was caused by the rebellion or contumacy of Thákurs, especially by the rebellion of the Thákur of Ahwa, who had taken a body of the mutinied Jodhpur legion into his service; but the ruling chief continued most loyal. Towards the south the extensive territory of Meywar was considerably disturbed by the confusion which followed the mutinies at Nímach, by the continual incursions of rebel parties, and by some political mismanagement; while the attitude of some of the most powerful feudatories, and the stir among the wild tribes and semi-independent Bhíl chiefs, caused by the general agitation, weakened and hampered the Meywar Chief's power to act. On the whole, however, this large tract of country remained comparatively quiet; nor was there any serious disorder among the outlying States of Dungarpur, Bámswára, and Pertábgarh; indeed the Chief of the State last mentioned distinguished himself by a vigorous stroke against the rebels. The Haráoti Chiefs of Kota, Bándi, and Jhálawar kept their States in hand and sent forces which took charge of Nímach from July to September, the period when the odds ran heaviest against the British in North India.

After the fall of Delhi this period of suspense ended, and the States could afford to look less to the question of their own existence in the event of general anarchy, and more to the duty of

assisting the British detachments. Moreover, the British were now in a position to assist the States in pacifying the country. The strong and leading State of Jaipur at once joined heartily in the exertions of the British Government to pacify the country. In Jodhpur the Chief had his hands full of work with his own unruly feudatories, and the British assisted him in reducing them. In Kota, unfortunately, the Political Agent had returned to his post too early for his safety. The Kota troops were profoundly disaffected; they were beyond the control of the Chief; they murdered Major Burton in the Residency, and broke into open revolt. The adjoining Chiefs of Búndi and Jhálawar gave no aid, partly through clannish and political jealousies of Kota; but the Maharaja of Karauli, who greatly distinguished himself by his active adherence to the British side throughout 1857, sent troops to the aid of his relative the Kota Chief when he was besieged in his own fort by his mutineers, who held the town until it was taken by assault of a British force in March 1858—an event that marks the extinction of armed rebellion in Rajputana. In Meywar matters remained in a critical state until the autumn of 1859, when the threatening symptoms of imminent outbreak among the Bhíl tribes, and insurrection among some of the leading feudatories, gradually subsided.

Thus, within forty years of the settlement of 1817-18, the Rajputana States encountered another political storm, which was short, but very dangerous while it lasted. It brought out both their weakness and their strength; it showed that their military organisation would be not more effective against the trained mercenary bands of Eastern and Northern India than it had been against the Marathas fifty years earlier, while, on the other hand, it proved the solidity of their interior political constitution. All serious disorders in these States were caused by mutinous mercenaries either in the service of the British Government, or of the Chiefs. There was no question of internal treason, or of plots for the subversion of rules or dynasties; and although in Meywar and Marwar the more turbulent of the great landholders sought the opportunity of strengthening themselves against the central rule, yet on the whole the clans and the people held loyally to their hereditary Chiefs. The country at large probably suffered little. There was no great commerce or trade interest to be ruined by the suspension of all industries. None of the large towns were plundered, except Kota, and most of them were very well protected; while to the clans and the country-folk generally a rough time, chronic insecurity, and the necessity of self-defence, were nothing unusual, and even the sharper disorders could not have been felt as they were in more highly organised societies.

SECTION VII.

PART I.—POLITICAL INSTITUTIONS AND STATE OF SOCIETY.

We have now sketched very briefly the course of events which has brought the existing States of Rajputana to their present political condition, with definite territories and assured relations to the Empire of India. Of the States, eighteen belong to the first rank in the Empire, being under treaty with the Imperial Government, and of these eighteen, fifteen are still ruled by the Chiefs of Rajput clans or families; the other three belonging to Jât families, and one to a Mahomedan dynasty. A sixteenth Rajput State is Shahpura, which has no treaty with the Empire, and which differs from the others both as to its origin and as to the nature of its political connections. The ancestor of the Chief of Shahpura was a third son of one of the Rânas of Meywar, who received as an appanage a grant or assignment of lands then belonging to Meywar. Those lands one of the succeeding Shahpura Chiefs united with a grant of eighty-four villages made to him by the Emperor Shâh Jehân in the seventeenth century out of the imperial district of Ajmer; and the whole tract, as shaped and altered by subsequent events and changes, now constitutes the Shahpura State. The Chief thus holds by distinct grants from two different superiors, the Râna of Meywar and the Empire; to the former he still does the formal service paid by a great noble of Meywar, while for the latter a Political Agent exercises a general superintendence over his administration. These sixteen Rajput States may be arranged according to the different clans which founded them—and to which the ruling family of necessity belongs—in the following manner:—

Clan	Subdivision or State	State
Rathor	{ Jodhpur (Marwar). Bikanir. Kishengarh.
Sisodia	{ Meywar (Oodipur). Banswara. Dungarpur. Pertabgarh. Shahpura.

Clan.	Sub-Division or Sept.	State.
Chchán	{ Hára Deoria	{ Búndi. Kota. Sirohi.
Jádon	Bhátthi	{ Karauli. Jesulmer.
Kachwáha	{ - - - - - { Naruka	Jaipur. Ulwar.
Jhála . . . . .	.....	Jhálawar.

The small chiefship of Khetri in the Shekhawati district of Jaipur is held on a double tenure of the same kind as that of Shahpura, as the Chief holds one part of his territory, the parganah of Kot Pútti, by a grant made on the part of the British Government by Lord Lake in 1803 to Raja Abhi Singh of Khetri, and subsequently confirmed as a free gift in perpetuity. On the eastern border of Rajputana, beyond the States of Búndi and Kota, are seven estates called the Seven Kotris, held by seven Rajput families of the Hára clan, which belong to a peculiar political arrangement. These were originally assignments of land made in the seventeenth century by a Búndi Chief to his grandchildren, from whom the families now in possession claim descent. All that country was under the oversight of the imperial governor of the fortress of Rinthambor (which commanded the Eastern Marches) to whom these petty Chiefs paid tribute. In the eighteenth century Rinthambor had to be abandoned by the sinking empire and was made over in charge to the Jaipur Chief, who levied tribute from the Seven Kotris and harassed them; whereupon they appealed to their powerful brethren, the Hára Chiefs of Kota and Búndi, and in the nineteenth century it was settled that the tribute should be paid through Kota to Jaipur. Thus, by status, they are tributaries to the head of their clan, the Hára, whose authority they own generally, and who is generally responsible for them to the Imperial Government. There are other minor Chiefs of a similar class in different parts of Rajputana, who claim some kind of privileged status and separate jurisdiction under the

ruling power of the State within which their lands are included. This claim is usually by virtue of having descended from a distant stock, or of having originally conquered and maintained their lands without aid or commission from the State's ruler, but on their own score and venture; they nevertheless pay tribute to the State's Chief, and are subject to his general authority. Such are the Chiefs of Sikar in Jaipur, of Nimrána in Ulwar, of Fatchgarh in Kishengarh (though he pays no tribute), and of Kusalgara in Bānswāra, though the last-mentioned Chief (who also holds land of Rutlam) has of late been withdrawn from direct subordination to Bānswāra. The Bhil Chiefs of the Meywar hill tracts belong to a slightly different category, though they assert internal independence of Oodipur; and the Thákur of Láwa, a small feudatory, has for peculiar reasons been recently declared separate from Tonk, to which he was subordinate up to 1870. Besides these minor or mediatised chiefships, there are other gradations of status and privilege; but their classification becomes indistinct as it descends, shading off into the great estate-holder and head of a branch family of the Chief's blood, with high rank and formal hereditary privileges rather than separate political jurisdiction. Of these, perhaps the best example is the Rao of Salumbar in Meywar, who is also very powerful in his own dominion among the wilds of the *Chappan*. The remaining three States of the first class, not being under Rajput Chiefs, are of a different origin and growth. The State of Tonk has been already mentioned; it was formed out of the convention which allowed the famous Ameer Khan to hold certain lands which he possessed in 1817; it consists of six separate districts, of which three only are within the administrative province of Rajputana. The Ját States of Bhartpur and Dholpur are the other two: the first is governed by the descendant of the bold and adroit landholders who raised themselves to the rank and power of territorial Chiefs during the confusion of the eighteenth century; the second (Dholpur) is the territory remaining with a family that had gained distinction earlier, though it first acquired political independence in the same century and under similar circumstances. But whereas the Bhartpur Chief kept his territory intact, and even increased it, during the contest between the Marathas and the English at the beginning of this century, the Dholpur Chief in the same period lost a great part of his acquisitions. And these two States, lying as they do outside Central India, did not fall within the range of the treaty of 1817-18. These States, therefore, are governed each by a family of the Ját tribe, which gives to that particular tribe a sort of precedence and privilege in the State; but their constitution is by no means tribal in the meaning with which

that word applies to the territory of a Rajput clan. In Tonk the descendant of Ameer Khan is an autocratic Nawab of the ordinary Indian type.

In the chapter on History it has been explained that the existing Rajput States trace their historic descent from the ancient tribal settlements in this part of India; and as they differ in origin from the great majority of States in other parts of the empire, so they still differ in political constitution. A Rajput State, where its peculiar structure has been least modified, means the territory over which a particular clan, or division of a clan, claims dominion for its Chief and political predominance for itself, by right of occupation or conquest. A Rajput Chief is the head of a clan which have for many centuries been lords of the soil, or of the greater part of it, lying within the State's limits; and as a ruler, instead of being an absolute despot, he exercises a jurisdiction more or less limited over an aristocracy consisting principally of his kinsmen and connections, while in the cities and throughout the districts not within the estates of great fief-holders, his authority is absolute. In the western States, where the original type is best preserved, the dominant clans are still much in the position which they took up on first entry upon the lands; and there we find all the territory (with exceptions in favour of particular grantees) still parcelled out among the Rajputs; mainly among the branch families of the dominant clan and their offshoots. All the lands either pay rent immediately to the ruling Chief, who must of necessity be a Rajput, or to some minor Chief within whose lordship they fall, or else they are held by septs or cultivating groups of Rajputs, who pay a fixed quit-rent to some overlord, who may be the head of the clan, or of one of its great branches. And as in all these lands the lordship cannot, in the present phase of society, pass permanently out of Rajput hands by which they are held on a sort of noble tenure, it may be said that in these States the territorial dominion of the clan still survives unbroken. Of course, there are grants of land made by the ruling Chief to favourites and others, and these are temporary alienations; while in the eastern States there are some considerable non-Rajput beneficiaries. But all over the west it would be difficult to find a single important estate not held by a Rajput. The supreme governing authority in a Rajput State is, of course, in the hands of the hereditary Chief of the dominant clan, who is supposed to be the nearest legitimate descendant in direct male line from the founder of the State, according to the genealogy of the tribe. He is thus understood to represent the oldest and purest blood of the political group which traces back its common

are owned and inherited by Chiefs who much resemble the State Chief in miniature, where they are strong and independent. The relations of these minor Chiefs to the State Chief differ very much in different States; in the best-preserved States of the west and south-west they exercise almost complete jurisdiction each within his own domain proper; and their obedience to any unusual command of the State Chief depends on his power to enforce it. They pay him certain dues or assessed contributions rated upon their incomes and regulated by immemorial custom; they are bound to render military service against the foreigner or against rebels, and to make additional emergent contributions in war time; and their lands are usually rated at so many horsemen or footmen to be furnished yearly for the ordinary public service. The number of followers to be maintained may depend on the value of the land, and upon the rank and consequence of the estate-holder. At every succession to an estate the heir is bound to do homage to the Chief, and to pay a fine of some value—these acts being essential to entry into legal possession of his inheritance. He also pays some customary dues of a feudal nature, and is bound to personal attendance at certain periods and occasions. In the States of the west, belonging to the Rathor and Sesodia clans, the domains of all the subordinate Chiefs are rated at a certain valuation of annual rent-roll; and for every thousand rupees a certain number of armed men must be provided for the State's service. In some States this service has been commuted for cash payment, but the great landholders have usually resisted this change, which obviously tends to increase the Chief's power and to lessen their own. Disobedience to a lawful summons or order involves sequestration of lands, if the Chief can enforce it; but it is rare that an estate is confiscated outright and annexed to the crown lands, as the whole federation of minor Chiefs would be against such an absorption if there were any practical alternative. So long as the minor Chiefs fulfil their customary obligations, they hold their estates on conditions as well founded and defined as those on which the ruling Chief governs his territory, and their tenure is often just as ancient, and their authority within their own limits often as absolute.

In fact, the system upon which the land is distributed among the branch families and other great hereditary landholders, is the basis of the political constitution of a Rajput State and forms its characteristic distinction. And this system is not, speaking accurately, feudal, though it has grown in certain States into something very like feudalism. The tenure of the great clansmen involves military service and payment of financial aids, but its source is to be found in the original clan-occupation

of the lands, and in the privileges of kinship and of purity of descent from the original occupants or conquerors. The subordinate Chiefs really claim to be co-parceners with the rulers in their right to dominion over the soil and to the fruits of it. Of course, this constitutional principle has been much changed in practice in many of the States, especially since the Marathas disorganised Rajputana at the end of the last century. In the Eastern Rajput States, which were most exposed to the attacks of Moghal, Maratha, and Pathan, the clan system has been much effaced politically, and some Chiefs have centralised their power so as to obtain almost absolute jurisdiction over the whole of their territories; moreover, the Rajputs are very few among the populations of some of these States. In Kota the clan system was almost extinguished by Zâlim Singh, who brought the land mainly under the direct fiscal management and substituted his own armed police for the feudal contingents. In Bûndi some relations of the Chief still hold large grants, but without any independent jurisdiction. Bhartpur and Dholpur are Jât States in which the Chief's power is supreme, and in the Mahomedan State of Tonk the Rajput landholders have been inevitably depressed, while the government is of the ordinary autocratic Mahomedan type. So that whereas in the north and west a ruling Chief would still hardly break through the compact front which his clansmen could at once oppose to any serious political encroachment, and has a dubious jurisdiction within the domains of his leading kinsmen, in the east and south a Chief has his State more or less directly under his own executive power, and a people of whom his clansmen form a small part. In the small eastern State of Karauli, however, the clan system is still vigorous.

money payment from the great landholders or Thákurs, so the Thákur demands service and dues from his kinsmen and other Rajput holders of lands in his estate; and the Thákur is entitled to the customary rents from all cultivators. Where a ruling Chief has become despotic, he has sometimes reduced the great Thákurs to mere assignees of land revenue, bound to do court service, but without any real political influence or civil authority.

On the western border of Rajputana is a peculiar tract called Malláni, within the territory of the Jodhpur Chief. It is possessed by a sept of the Rathor clan, which claims descent from the original stock of the whole clan by a line earlier and more direct than that of the Jodhpur Chief himself; consequently they have always claimed a sort of independence, and as the rule of equal division of inheritance is more or less in force within this particular sept, the whole country is parcelled out among family groups; and there are no very great landholders. The Shekhawati sept of the Kachwáha clan, which inhabits the northern districts of the Jaipur State, has been long in a similar condition of de facto submission to the Jaipur Chief; and here also the rule of equal division prevails, though a few great estates have been consolidated. The tenure of land is so intimately connected with the political constitution of a State, that the condition of these tracts may be thus far properly mentioned here.

The political condition of the hilly tracts belonging to Meywar is rather complicated. These tracts are inhabited by Bhíl tribes who are connected with the Oodipur State by different relations. Some of them are directly under the State's government; others are under the immediate jurisdiction of great Rajput nobles, whose lands they inhabit, while a third section is under its own Chiefs, whether pure Bhíl or of the half-blood, who pay tribute to Oodipur, but are very independent within their own domains.

The actual administrative organisation of a Rajput State is usually of the simplest kind. Whatever central authority exists is in the hands of the Chief himself, who reserves final control over all departments and judicial courts, and whose personal superintendence when he has a turn for government is felt everywhere. He is usually assisted and advised by two or three principal officials; and in some States by a Prime Minister, real or nominal. Written laws are not made except where a code or a set of rules is adopted from the English system at the instance of English officers, but the customary rules are of some force, and general standing orders are issued, which are more or less

obeyed. The territory of a State is sub-divided into districts, to each of which an officer is appointed whose powers are generally plenary, though the revenue business is sometimes separate from the judicial in the best administrations, and sometimes the police are regularly organised, though more usually they are merely armed retainers. At each capital there is a jail, managed very well in some of the eastern States, elsewhere in a rudimentary condition, while in the more primitive States it is usual to release all convicts when the Chief is *in extremis*. In some of the States regular civil and criminal courts have been set up, which are mainly instruments of the executive, when it is efficient, and where the executive is inefficient the courts are no better. The indigenous judiciary of the country, for the settlement of all civil and a good many criminal cases, is the Pancháyat, or jury of arbitration—a system which has been maintained under British superintendence for adjusting criminal cases which cannot be decided by any one State. All severe criminal sentences must be confirmed by the Chief; nor has any one else, even in the great estates, the power of life or death; indeed it is very rarely that any Hindu State formally executes a capital sentence upon a convicted criminal. Brigands and murderers are more often taken dead than alive. All matters in dispute between two States—claims for extradition of criminals, and the like—are decided by courts of arbitration, or referred to the British Government.

on the Chief's caprice, and they are engaged in one incessant struggle for place with a number of other hereditary place-men. As the tendency of all office in Rajputana is to become hereditary, and as the right of the children and relations of an official to be provided for in the public service is universally recognised, the Chief is always surrounded by a crowd of qualified claimants. It is not uncommon to put them all on a roster, giving each a turn; and the late Chief of Marwar compared this system to the Persian wheel, which revolves with a ring of earthen pots, each of which is in its turn dipped into the well, and soon after emptied into the trough above. The latter part of the simile refers to the time-honoured practice of squeezing an official before his retirement. Some of the official families are descended from persons of the writing or commercial caste, who accompanied the earliest emigration of the ruling Chiefs into the country.

The great estate-holders, called the *Thákurs*, live most of the year in their forts within their own lands, and in the west they manage their own domains with little State interference, distributing justice and collecting their taxes and rents. When some complainant has interest enough to get an appeal seriously taken up at head-quarters, or when some disorder or deed of notorious violence has created scandal, the ruling Chief interposes vigorously, though the matter is usually settled by a fine or a present. Where the *Thákurs* are most independent they go little to court, though there is usually a fixed period when each man of rank is bound to attend on his Chief, and on great occasions they all assemble. Where their separate status and power have been much reduced, they gravitate towards the level of privileged courtiers, whose places in the Chief's presence and at ceremonies are regulated by very minute etiquette. But a turbulent noble of the old school does not much enjoy a visit to court, where there are usually long outstanding accounts to settle with astute officials; he goes there well attended by kinsfolk, and fences himself in his town house, where he occasionally stood a siege in the last generation, and was sometimes murdered. It may be said that all the internal disorders of Rajputana since 1818, which were serious and wide-spread up to recent years, have been caused entirely by disputes between the ruling Chiefs and their nobles; the Chiefs striving to always depress and break down the power of their great kinsmen, the nobles being determined to restrict the strength of their ruler. The Maratha invasions and usurpations had much diminished the strength of the State's ruler; on the other hand, the English supremacy is favourable to him, and the inclination of an English government is naturally towards support of the central administration. Nor has the time

of armed resistance by nobles to their Chief yet passed away in the west and south-west, where a Thakur will still, if aggrieved, hold out as long as he can in the ancestral fort, and if the fort is made too hot for him, take to the wilds with his kinsmen and become an outlaw and leader of banditti. Usually these proceedings end in compromise and reconciliation.

The religious directors of a Chief are important personages, and have often played their part in politics, as in the case of the Nāths of Jodhpur in the first quarter of this century; they are sometimes very rich and influential, particularly when they are also the head centres of a sect, or the guardians of a shrine, and they always receive the respect due to mysterious folk with whom no sensible person desires to quarrel.

In the principal towns the commercial classes are strong, and have much influence in a country where every one is more or less in debt. The number of rich bankers and trading firms having their head-quarters in the northern cities of Jodhpur, Jaipur, Bikanir, and Jesulmer, is remarkably beyond proportion to the actual commerce or wealth of those States. But these towns were asylums and cities of refuge in the deserts when the great commercial centres on the high roads of India were incessantly exposed to pillage, and when even the imperial capitals, Agra and Delhi, were constantly swept by revolts and dynastic contests. The eighteenth century was the golden age of the Rajputana banker; and it will be found that many of the best houses date from that period, having been founded by men who kept the military chests of a great predatory leader, or who advanced heavy loans at critical times. There has also always been a good deal of legitimate trade through these midland countries. As times change, the peculiar conditions under which the monied classes prospered in Rajputana are fast disappearing, since political order has drawn back capital to its natural employment in the richer regions of

than upon the crown lands. Rajputana generally is in that economic stage when the capitalist does not acquire property in land, however much the proprietor may be in debt to him, but merely extracts what profits he can out of the actual possessor. All the landed proprietors, high and low, borrow money up to the limit of their credit; yet the bankers are said not to own a single entire village in the north-western tribal States--a remarkable contrast with the condition of British India. When a Rajput landholder of rank is hopelessly in debt, the creditors apply to his Chief, who sequesters the estate and arranges with creditors for gradual liquidation; when a cultivator breaks down, the village banker settles with the revenue collector the terms upon which his produce shall be shared between all three. In the Rajput States proper the organised village community of cultivators, so well known in other parts of India, can hardly be said to exist as an institution, though in Bhartpur and the eastern States generally many tracts are occupied by strong cultivating tribes such as the Játs or the Gujars, whose position is much better than in the west or the south. In the British district of Ajmer the administrative system has, of course, produced an exceptional state of society, to which this description does not apply; and one or two of the eastern States are adopting the British system of land revenue settlement.

PART II.—POPULATION, PRINCIPAL TRIBES, CASTES, AND OTHER
SUB-DIVISIONS.

It is very difficult, of course, to give any concise account that shall be fairly accurate of the divisions of the populations over a wide extent of country, and statistics are almost entirely wanting; but the outline is something in the following way. In the Rajput States, the pure Rajput clans occupy the first rank, though by rigid precedence it would be taken by the Brahmins, who are numerous and influential. The Rajputs nowhere form a majority of the whole population in a State; they are strongest, numerically, in the northern States and in Meywar. With the Brahmins may be classed the peculiar and important caste of Chárans or Bháts, the keepers of secular tradition and of the genealogies. Next in order would come the great mercantile castes, mostly belonging to the Jaina sect of Hinduism, some of them undoubtedly of Rajput extraction, though separated by difference of profession and worship from the clans. Then come the principal cultivating tribes, such as the Játs and Gujars. After these may be mentioned the tribes of uncertain origin peculiar to Central India, who occupy the out-

lying tracts and the skirts of the open country, of whom the Minas and Mers are the best specimens. Most of these claim irregular descent by the half-blood from Rajputs, while some of these mixed races are closely connected with the Bhils, and they shade off, according as they are more or less settled down to cultivation and a quiet life, from industrious agriculturists into predatory tribal communities. The Meos (now converts to Islam) the Mers, and the Minas, are evidently allied species, whether by similarity of origin and way of life, or by remote descent from the same stock, is uncertain. Some reasons have been given for tracing the earliest habitations of the Minas and Mers to the Indus Valley and the Upper Punjab, and the Mers have been suspected to be a relic of the Meds, an Indo-Scythian tribe that crossed into India from Central Asia.* Lastly, there are non-Aryan groups of pure Bhils, inhabiting long stretches of wild and hilly tracts, where they live almost independent, holding together under their own petty Chiefs and headmen, paying irregular tribute or rents to the Chief of the State, or to the Rajput landowner upon whose estate they may be settled. There are also, of course, a good number of Bhils, as of all other half-tamed tribes, who have mixed with the general population and are to be found scattered among the villages on the outskirts of the wild country.

distribution; in the north-west, in the country of Marwar, Bikanir and Jesulmer, in the State of Kishengarh, and all about the central district of Ajmer, the Rathors greatly predominate; they are probably the most numerous of all the clans: in Jesulmer the Bhattis rule. Then, in the north-east States is the Kachwáha clan, very strong in Ulwar and in Jaipur; some districts in the north of Jaipur being altogether in the hands of the Shekhawat sept of the Kachwáhas. The Chohans, once famous in the history of the north-west of India, are now most influential in the eastern States, where the Hára sept has been long dominant; and the Deoras, another sept of the Chohans, still hold Sirohi, while the Khíchis also belong to them. In the north-west the last trace of the ancient predominance of the Chohans at Delhi is to be found in the petty chiefship of Nimrána, held by Chohans who claim descent from Prithi Ráj, and in the extreme north-west the Rao of Kusalgarh in Bánswára is the head of a Chohan colony. All over Meywar and the north-west States of Rajputana below the Arvalis, the Sesodia predominates, the clan's head being the Maharána of Oodipur, the eldest family of the purest blood of the whole Rajput tribe. Among other clans of high descent and historic celebrity which were once powerful, but have now dwindled in numbers and have lost their dominion, may be named the Parihar, the Pramara, and the Solankhi.

So much has necessarily been said of Rajput institutions in describing the political constitution of the States, that the account of their social condition may be short. The clans are, of course, the aristocracy of the country; and as such they hold the land, to a very large extent, either as receivers of rent or as cultivators. By reason of their position as integral clans of pure descent, as a landed nobility, and as the kinsman of ruling Chiefs, they are also the aristocracy of India; and their social prestige may be measured by observing that there is hardly a tribe or clan (as distinguished from a caste) in all India which does not claim descent from, or irregular connection with, one of these Rajput stocks, and that every inferior tribe and family as it rises in the Indian world models its society more or less on the Rajput type and probably assumes a Rajput clan name. The Rajput proper is very proud of his warlike reputation, and most punctilious on points of etiquette, knowing the value of forms in keeping up substantial rights in the matters of equality and fraternity.* The tradition of common ancestry has preserved among them the feeling which permits a poor Rajput yeoman to hold himself as good a gentleman as a powerful landholder of his own clan, and immeasurably

* "Le gout des formes, choses ennemies de la servitude."
(Tocqueville Ancien Régime.)

superior to a high official of the professional castes. In fact, to a Rajput, his genealogy is the essential characteristic of his position in life, and his kinship the supreme consideration: it determines his tenure of land, his rule of inheritance, and his marriage connections. As a class, Rajputs live either by the rents of land, by cultivation, or by service; they rarely engage in commerce, except as guards of convoys, and they still in the west organise occasional plundering expeditions. In the disturbed times that preceded the English pacification of the country, they lived very largely upon plunder, and upon the levy of black-mail, and the disappearance of these resources will have turned the present generation of Rajputs to cultivate more largely than their fathers did. The clansmen very rarely took service in the native army of the English, though large contingents under their own Chiefs served the Moghal. They are very superstitious, but caste rules sit lightly on them, and they can use a Brahmin very unceremoniously; they are eaters of flesh, preferring goats to sheep, and wild pig to everything; they drink very strong spirits, and are great consumers of opium. The poorer Rajput is, of course, illiterate, but the upper classes are not without education, and some of the Chiefs have always been patrons of literature and art.

the assumption that the whole of a great clan scattered over half a dozen parts of a large country are kinsfolk, and that marriage between such kinsfolk is incest. Thus, while all inheritance, political or proprietary, goes through males exclusively, and while the mere bearing of the same clan-name is a complete bar to matrimony, on the other hand relationship through females gives no kind of claim-whatever to inherit, and is no sort of bar to a marriage, except only that a man does not marry into his *mother's* family. His maternal aunt, for instance, he could not marry; his maternal cousin he could. Here, as wherever exogamy prevails, marriage by abduction of the bride flourishes universally in form, wherever it has decayed in fact; and the ceremony may be witnessed in great perfection at any marriage in high life, when the bridegroom arrives with his wedding band of armed kinsmen, who clash their arms and rush in with a shout upon the bride's party. It can be easily understood that exogamy has always operated to stimulate jealousies and heart-burnings between clans, and to make the taking of a wife a still more troublesome and perilous business than in civilised life; for it leaves the supply of wives in the hands of a neighbouring clan, always jealous and often at open feud, who may suddenly refuse to give their daughters, as in the famous story of the war between Israel and Benjamin. Disputes over brides and betrothals have been important in Rajput history. Socially, the custom makes marriage difficult by narrowing the field of selection, for a man cannot go very far among strange tribes to seek his wife, nor a father to seek a husband, so that a poor man often does not marry at all, while a rich man of high birth is besieged with applications for his hand, in order that the stigma of an unmarried daughter may at least be formally removed. To this state of things may be traced in some degree the rarity of heirs in Rajputana, and it has a direct tendency to encourage polygamy and female infanticide. There are in Rajputana many distinct castes who are of pure Rajput origin, but were detached by following a peculiar religious movement. When a Rajput turns aside after the new light shown by one of the spiritual teachers who are incessantly arising in Hinduism, and completely adopts a new way of life, he exchanges a tribe for a caste; and it appears (though the subject is very obscure) that, whereas his tribal bond of consanguinity extended round his whole clan, in the caste his kinship is at once narrowed down to that section of the great caste group which was originally Rajput. The most famous sect in Rajputana holds within its pale no less than 1,444 distinct groups, all apparently formed by this process of partial accretion intermarrying one with another, but never *within* themselves. In this

selves as servants of the soil, and from the produce of the soil only will they deign to live. They share the actual produce of the land with the proprietor or with the State; they are consequently treated with consideration, and the general sense of joint-stock ownership in the land gives them a feeling of independence, and even of pride, that is not attached to tenure by money rents with liability to eviction on non-payment. The day labourers, on the other hand, are badly treated and regarded as drudges, often subjected to forced labour and under no protection. They have none of the independence or comfort which the class is rapidly gaining in British territory under an economical system, which affords plentiful employment to the working man, and constantly tends to produce an interchange of position between the cultivating and labouring classes.

It may be worth mentioning that to a clan or caste is sometimes attached an impure species which goes by the name of *Dussa*, meaning ten, the words being numerically symbolic of a half-breed, the full blood being represented by the number twenty.* Brahmins, Rajputs, Bunyas, have all *Dussa* branches.

The Musalmans are numerous in the north-eastern and the eastern States, and in Ajmer, where is one of the most famous Musalman saints in India. They are generally the descendants of immigrants from other parts of India who have sought service with the Chiefs or have engaged in commerce with these parts; and the Mahomedans still hold important places among the chief officers of many Rajput States. In the pure Hindu States of the west and south-west they are rare, perhaps rarest in Meywar; but in Marwar they have been from time to time influential. But the special feature of Islamism in Rajputana is to be found in the clans or indigenous tribes who have been converted to the faith. These are most remarkable, as may be guessed, in the districts near the well-established centres of Musalman power and influence, in the State of Ulwar which lies in the extreme north-east close to Delhi, in all the country bordering the basin of the Jumna, and about Ajmer. In Ulwar and North Jaipur the Khánzádahs are descendants of a group of families, bearing that common denomination of uncertain origin, who were dominant in those districts during the sixteenth century; their principal Chief fought on the Rajput side against Baber in 1528. The Káimkhánis are a clan of similar origin in the same neighbourhood; the Meos are an indigenous tribe, numerically very strong in Ulwar and Bhartpur;

* Ten fingers and ten toes, all pure bred ?

other groups of their tribe, neither intermarrying nor eating with them. This section of the tribe is, of course, sub-divided into *gots* or different stock families, of whom some claim descent from a cross between Mínas and Brahmíns; the others mostly from a cross with Rajputs. In the Ulwar State alone there are 146 different *gots* of Mínas. In Jaipur the Mínas are the hereditary guards of the State's Chief, and on every succession a Mína performs the ceremony of *tika* or investiture for the new Chief, which is a sort of conveyance of a title from the acknowledged predecessor. The same custom prevails in several other parts of India, and illustrates the strong aversion of primitive races to anything like prescription, or the arbitrary cutting of a chain of transmission of rights. According to early ideas, every such claim must run back until it is lost in obscurity; usually it goes back to some miraculous event or divine personage.

The wilder Mínas have their special habitation in three particular tracts. Of these one is called the Kherár, a rugged bit of country lying in the north-east corner of Meywar, about the town of Jeházpur, and within the Búndi territory adjoining. They call themselves the Parihar Mínas, claiming half-blood with the well-known Rajput Parihars, and it seems certain that they held this part of the country before the Rajputs. They are famous as savage and daring marauders. Zalim Singh of Kota carried fire and sword into their lands early in this century; and in 1857-58 they committed great excesses, and were put down with much severity in 1860 by the Rajput Chiefs. They are, as might be guessed, lower in social standing than the Mínas of the north and much less Hinduised. Further southward again, in the south-east corner of the Meywar State, there is another stretch of hill country and jungle called the Chappan, running up to a little west of Nímach. It has been roughly described as a square, of which the corners are marked by the towns Oodipur, Dungarpur, Pertábgarh, and Nímach; and its high lands are studded with Mína villages, lying within the great estates of Meywar nobles, whose orders the Mínas obey. The villages consist of scattered houses on the sides, or at the foot, of hills; the Mínas have, for generations, wholly been given to robbery and general lawlessness; the district which needed an armed force to bring it to order 50 years ago is still one of the most difficult and troublesome in Central India. Lastly, we have the Mínas in the far south-west of Rajputana, who occupy the wild country in the north of the Sirohi State, and are intrenched among the inaccessible spurs of the Arvalis, who cultivate least and plunder most, maintaining incessant guerilla warfare with the State authorities, and who are at the lowest range of the social scale, caring little for caste rules

who had been defeated or otherwise forced to take to the hills, and who there intermarried with the tribe.

There is a widely spread tribe of professional thieves which is by origin evidently nothing but an association for the purpose of robbery, and as yet lays little claim to any common descent or original stock, though it is, in a loose way, a distinct tribe. These people are called Baorias north of the Arvalis, and Moghyas south of the range, but they are understood to be one tribe under two names. To the north they are found mostly in Marwar, and to the south they are most numerous in the country round Nimbahera and Nimach, where the territories of Tonk, Meywar, and Gwalior meet and are mixed up. Formerly they were well known as mercenary soldiers, bold, hardy and most licentious, and they took their share in the disorders at the beginning of this century. They eat all kinds of flesh and drink liquor; they appear to be merely an association of banditti that has got itself a common name; but even these people pretend to a remote descent from Rajputs, and shape their internal society upon the model of a Rajput clan, having a multitude of subdivisions kept separate by the rule prohibiting marriage between two members of the same group, which is assumed to be a group of kinsfolk.

Perhaps we may conjecture that all these tribes which are classed as half-blood have for their main stock the descendants of some tribe that the Rajputs overcame, and with which some of the Rajputs intermixed in the backwoods. But it also seems certain that the tribe's number has been constantly augmented by the admission of other stocks and families, which have from time to time been driven into the jungles by various causes, or have taken to a plundering life. These different contingents have become amalgamated under the tribal name, which probably represent little more than an association of people brought together from various causes and chances, and kept together by the same needs and circumstances, by a common way of life, and by inhabiting the same tracts.

The only tribe in Rajputana that may be termed aboriginal is that of the Bhils. There is not room here for a full description of them, they extend down through Central India to the Narbada; the northernmost limit of the country which they inhabit being marked roughly by the Arvalis. They are strongest and most independent in the hilly tracts into which the Arvali range spreads out over the south-west parts of Meywar and of Serohi. These tracts, called the Bhil tracts, stretch from Serohi to Dungarpur, and are almost exclusively occupied by Bhils, though that particular wilderness called the Bhákar, consisting

The expeditions sent under British officers against the Bhíls rarely effected anything permanent, while the native governments were only strong enough to oppress and exasperate them, without subduing them. In the course of time, however, matters have improved; the Bhíls are now fairly pacified, and will be gradually reclaimed by careful management.

So far as can be ascertained, the Bhíls are all sub-divided into a variety of clans, some based on a reputed common descent, others apparently huddled together as a group by simple contiguity of habitation, or by the banding together of neighbours for plunder or self-defence. They worship a number of local deities, and they have a slight infusion of Hinduism in their ideas upon religion; their dead are, in Meywar, usually burned; their terror of witchcraft leads them into great cruelties. Their language is largely intermixed with the dialects prevailing in the nearest open countries. Whether they have anywhere preserved a separate tongue is not clear.

The Bhíls are not all in the wilds; a great many have settled down to agriculture in the open country of Dungarpur and Báns-wára, where they are industrious and orderly cultivators, and in Serohi, where they have mixed with the general village population. They are to be found in all the villages bordering on the hill tracts and jungles. It is very rare, however, that a village community of Bhíls can be induced to dwell in the plain; their immemorial habits still impel them to keep close to the edge of the jungle, and their villages are almost always backed by a hill or piece of wold into which they can retreat.

The Grassias who inhabit the Meywar hilly tracts and Serohi are now a distinct class or tribe under this denomination, separate from the Bhíls, and ranking just above them in social order. They have their internal *gots* or circles of affinity upon the model of a regular clan; and they seem to be half-breeds of some kind. They are most numerous in a tract called the Bhákar, a very rugged bit of hill-country, lying over against Aboo to the east in the Serohi State. The word Grassia appears originally to have meant what it still means in Guzerat and Malwa, Chiefs or head-men holding, by grant or prescription, the right to collect dues, usually of the nature of black-mail, from certain villages or upon certain lands or roads; and the Grassia of South-West Rajputana is probably of mixed Rajput blood; possibly in some cases he may indeed be a pure Rajput living in the backwoods. We may conjecture the title to have been extended to the original Grassia's folk and followers, that is, to his kinsfolk and retainers, perhaps also to the people who live on his land and are attached to him in various ways; so that after this manner the word Grassia is

monarchy. Of the 109 bhûm holdings in the district, 83 are held by Rahtors, nearly all the younger sons and brothers of the istimrârdars. The Rahtors of Ajmer have the same customs and characteristics as their brethren in Marwar. They are still warlike and indolent, and great consumers of opium. Each man carries at least a dagger, and, except under extreme pressure, none will touch a plough.

The pargana of Sáwar, at the south-eastern extremity of the Ajmer district, is held on istimrâr tenure by Sesodia Rajputs, and the estate is a portion of a grant made by Jehangir to Gokal Dás, who is said to have received 84 wounds in the service of the emperor.

The Kachwáhas Rajputs, like the Sesodias, are to be found in the villages adjoining their respective States of Jaipur and Oodipur, and hold bhûm in five villages.

The Játs were numbered at the census at 30,486. They, with the Gujars, are the original cultivators of the soil, and considerably outnumber any other caste. Nearly the whole of the Ramsur pargana belongs to them. They are settled in Kekri, and in the best villages of the Ajmer and Rájgarh parganas. In the Beáwar tahsil they hold seven villages, chiefly in and about the old town of Beáwar adjoining the Ajmer district, for they never penetrated far into Merwarra, and are not to be found in the Todgarh tahsil. They are divided into three main families—Puniyo, Seeshmo, and Harchitrál; but their *gots* are more than a hundred. As elsewhere, they are strong men and hard-working cultivators. They hold no revenue-free land nor any bhûm; they have in Ajmer double as much land as the Gujars, and pay three times as much revenue, partly, no doubt, owing to their having monopolised the best villages, but chiefly to their greater energy in making wells and improving their land.

The Játs worship a variety of gods, including Mátá and Mahádeo, but the chief object of veneration for all the Játs of Marwar, Ajmer, and Kishengarh is Tejaji, a sort of legendary hero half deified, who died from snake-bite. The Játs believe that if they are bitten by a snake and tie a thread round the right foot while repeating the name of Tejaji, the poison will prove innocuous. There is a temple to Tejaji at Sarsara in Kishengarh, and a fair is held in July. Tejaji is always represented as a man on horseback with a drawn sword, while a snake is biting his tongue. Nearly all Játs wear an amulet of silver with this device round their necks.

number about 11,638 and are good cultivators, and hold the greater part of Kasbah Ajmer. A peculiar caste, Kir, very few in number, devotes its attention to the culture of melons. The Rebáris, very few in number, breed camels and cultivate rice. The menial castes are Bhangis, Bulahis, Thoris, and Regars. Bulahis are the most numerous, numbering 23,040, and consider themselves superior to the Regars, who correspond with the Chamárs of the North-West Provinces. Mínas, Sánsis, and Bhíls are the thievish classes. None of them are numerous in the district.

Of the Mahomedans (47,310, including Meráts), 24,034 are classed as Sheikhs; Sayads are 3,219; Moghals 680; Patháns are numbered at 7,441; Deswalis hold two villages in the north of the district, and say they are Rajputs, who were converted in the time of Shaháb-ud-dín. The Bunjárás, who live in Ghegúl, are Musalmans, and were, they say, converted at the same time as the Deswalis. The Musalmans in the district are chiefly the attendants on the Mahomedan shrines, and most of them hold revenue-free land in the villages attached to these institutions. They are poor and idle.

PART III.—STATISTICS OF POPULATION.

Correct statistics of the population, and of its distribution into castes and tribes, are not available in Rajputana except for Ajmer; some attempts, however, have been made at approximate calculations of the number of people in each of the States, mainly upon the basis of counting the villages and obtaining a fair average of the number inhabiting an ordinary village. The results are subjoined; beginning with some precise details for Ajmer, which are added principally because Ajmer, being a central district, may be taken as giving some trustworthy standard for measure and comparison of the general condition of the people in a well-to-do part of this country.

Ajmer.—The area of Ajmer-Merwarra by the Topographical Survey is 2,710 square miles, of which about 1,440 square miles are fully assessed to the land revenue; the remainder is occupied by estates under perpetual quit-rent.

The total land revenue is Rs. 3,89,480, and the amount of local rates and cesses paid on revenue is Rs. 19,859.

The population is 396,331, and the number of persons per square mile 146·2. The total number of houses is 93,464, and the number per square mile 34, with an average of 4·2 persons for each house. The population of Ajmer proper is 309,914, with an area of 2,069·816 square miles, and of the tract called Merwarra 86,417, with an area of 640·864; the number of

persons to the square mile being in Ajmer 149, and in warra 135.

The population, according to sex, is thus divided—

Total males	212,267,
„ females	184,064.

giving a proportion of females to every 1,000 males of 867. Taking the proportion of the sexes in the two main divisions of the population, we find that in Hindus the proportion is—

186,595 males' } Females to 1,000 males 866.33;
161,653 females }

and in Mahomedans—

25,184 males } Females to 1,000 males 878.57.
22,126 females }

Dividing the population according to age, we have—

Total children under 12	} 125,421.
Total adults above 12	} 270,910.

Proportion of children to 1,000 adults, 462.96.

This proportion of children to adults is remarkably low by comparison with the larger provinces of Northern India. Probably in Ajmer many females above 12 have been returned as children, the tendency being always towards understating the number of girls.

The proportion of sexes (1) among children and (2) among adults is ascertained to be thus:—

Proportion of females to 1,000 males . .	{	Under	{	63,300 boys	} = 836.32.
		12	{	57,121 girls	
	{	above	{	143,967 men	} = 881.75.
		12	{	126,943 women	

These figures illustrate the general rule in India, that difference between the sexes is widest at the early ages, more males being born than females, and narrowest at full age, owing to the greater wear and tear of male life, and to the emigration of men in search of employment, &c.

The population is classified as

Hindus	.	.	.	.	.	348,248	=	87.8
Mahomedans	.	.	.	.	.	47,310	=	11.9
Christians	.	.	.	.	.	715	=	0.2
Others	.	.	.	.	.	58	=	0.1

Among the Hindus may be noticed the three indigenous tribes

Mers	.	.	.	.	.	.	53,402
Bhils	.	.	.	.	.	.	3,542
Mínas	.	.	.	.	.	.	3,163

Of the male population above 15 years of age, a percentage of 47·61 are returned as agriculturists, but this is considered to be under the mark.

Some 6,000 people are returned as beggars, which seems a large proportion out of the total population of 396,331. Most of these must be persons living by religious dole, or alms given to devotees.

The returns of education show that 19,605 persons in the district can read and write, of whom 19,228 are males and 377 females; and dividing the same total by age, we get 3,010 children to 16,595 adults. The percentage on the whole population is 4·94.

Rajputana States.

Bánsiwára.—The population is generally estimated at 150,000.

Bikanir.—Population 350,000. Játs are the most numerous caste, having double the number of any other. Next in numerical order come Banias, Rajputs, and Brahmins. The Játs are all agriculturists, and the three other classes cultivate extensively.

Búndi.—The population of Búndi is estimated at 224,000.

Bhartpur.—This State contains 743,710 inhabitants, which gives a population to each square mile of 376·74. Hindus number 630,242, and Mahomedans 113,445.

The population consists principally of Játs, Gujars, Brahmins, Banias, Mínas, in something like the following proportion :—

Sudras	30 per cent.	Gujars	7 per cent.
Játs	19½ „	Brahmins	6½ „
Musalmans	18 „	Mínas	2 „
Banias	17 „		

Dungarpur.—The population is estimated at 100,000.

Jesulmer.—Total population 72,000, of which 43,500 are Hindus, 26,000 Musalmans, and 2,500 Jains.

Dholpur.—Total 227,976 :—

Brahmins	36,884	Gujars	17,229
Chamárs	32,092	Káchis	15,090
Thákurs	23,703	Mínas	10,620

Jaipur.—In July 1870 a census of Jaipur city was taken, which gave a total of 137,887; the population of the whole State is estimated at 1,900,000.

Jhálawar.—Estimated in 1866 at 226,000.

Kota.—Estimated at 527,000.

Karauli.—The entire population amounts to about 140,000. The following is a table of the principal social divisions:—

Castes.	Total.	Castes.	Total.
Brahmin	24,900	Chamár	14,900
Traders	11,000	Káchi	6,900
Rajput	6,800	Musalman	6,900
Gujar	9,400	Koli	5,400
Mína	20,850		

Kishengarh—

Population 105,000

Marwar or Jodhpur—

Total population (about) 2,000,000

86 per cent. Hindus.
10 do. Jains.
4 do. Mahomedans.

Pertábgarh—150,000. Majority Bhíls.

Serohi—

Hindus 133,000
Jains 18,500
Musalmans 1,500

The more numerous classes are Banias, Rajputs, Kalbis, Dhers, Grassias, Mínas, and Bhíls.

Tonk.—320,000.

Meywar.—1,161,400, of whom 150,000 live on the hills.

A large proportion of the people are Rajputs, with Mers, Bhíls, and Mínas.

Uthar.—The population of this State, according to a careful census taken in 1871, was 778,596; of this number, 180,225 were Musalmans and the rest Hindus.

The Mínas are by far the most numerous agricultural class; Brahmins and Banias the most numerous non-agricultural. The Rajputs are fewer than any of the other important divisions; they number in all 33,817. A few statistics, taken from a census of 1873, are subjoined:—

Castes.	Population.	PROPORTION TO TOTAL POPULATION OF			
		Men.	Women.	Boys.	Girls.
Hindus	598,333	·34	·31	·19*	·15
Mahomedans	180,263	·32	·29	·22	·17

PART IV.—TOWNS.

The towns of Rajputana have their special characteristics. The largest are the capitals of the principal States, and have usually grown up around the forts of the Chiefs, in situations which, originally chosen for defence or retreat, are now striking and often picturesque. The Rajput capital is nearly always named from its founder: its citadel is usually on a hill close above, or placed in some commanding position over against the town; and the Chief's ancestral palace is sometimes within the fortified lines, sometimes lying below the stronghold, with ready access to it in case of need; while, here and there, a modern palace has been built apart from the fortress within the town. But the fortress and the palace, whether combined or separate, are the two conspicuous features of the Rajput towns. The suburbs often contain gardens and stone pavilions, while country houses of the Chiefs and nobles lie a little beyond; and the *Chattris*, or domed cenotaphs erected where Chiefs or men of mark have been burnt after death, often with their wives and female slaves, are usually at a little distance. Jaipur, the most modern of the Rajput capitals, is also the largest; it is laid out with spacious streets, and the hereditary taste of the ruling family has decorated and improved it for generations.

Jodhpur is a fenced city in the desert; its citadel stands on a great bare rocky hill overhanging the town which clusters round its base. Bikanir and Jesulmer are towns of the same type, built upon shoals of hard rock amid deep sand; they contain each a central fortress, some large temples, and very handsome private houses.

Ajmer is one of the most picturesque towns of India; it lies surrounded by low hills on the edge of a great artificial lake, right on the skirts of the fortified mountain of Táragarh.

Ulwar belongs to the same class. It lies under the lee of its hill fort, with a palace that is a fine specimen of modern Rajput architecture. Bhartpur, again, the modern Ját city, is of quite a different character. Its founder originally set up an earthen fort in the midst of a marsh, relying for protection on the mud and the water, as the Rajput did on the rock or the sand. The city is now surrounded by a wet ditch and strong earth ramparts, while the interior fort is encircled by similar lines. Tonk has similar fortifications.

South of the Arvalis, the city most remarkable for beauty and situation, and important as the capital of a first-class State, is Oodipur, with its palace placed on a low ridge surmounting a romantic lake. In the east are Kota, a town with a consider-

able* population and trade, surrounded by massive stone ramparts and bastions, which on one side run along the high bank of the Chambal; and Búndi, a small town occupying the opening of a hill pass into the plains, with a palace suspended over it on the steep hill side, and the citadel above on the summit; the whole presenting a rare picture of characteristic architecture and landscape. It is said to contain about 30,000 inhabitants.

Jhálrapátan is a place of considerable trade, which dates its prosperity from the days of Zálím Singh of Kota, about the beginning of this century. The city is nearly square, surrounded by walls and bastions; the streets are regular, and the houses have a good deal of architectural ornament.

A list is appended of all the towns of any size or substance in Rajputana, arranged under the States to which they belong.

List of Towns of importance in Rajputana, arranged under the territories to which they belong.

1. *British Ajmer and Merwarra.*

Ajmer.
Beáwar.
Kekri.
Pushkar or Pokar.

2. *Bánswára.*

Bánswára.
Kalinjra.
Kúsalgarh.

3. *Bikanir.*

Bikanir.
Bidesar.
Anupgarh.
Bhatner.
Bahadran.
Choru.
Nohur.
Rájgarh.
Renee.
Ratangarh.
Suratgarh.
Sujágarh.

4. *Bhartpur.*

Bhartpur.
Bhusawur.
Biána.
Balabgarh.

Deeg.
Gopalgarh.
Kama.
Khanwa or Kanúa.
Kombher.
Papari.
Rúpás.
Seekri.
Weir.

5. *Búndi.*

Búndi.
Indargarh.
Dublana.
Nainwah.

6. *Dhólpur.*

Dhólpur.
Báree.
Nagar.
Munesa.
Rajakhera.

7. *Dungarpur.*

Dungarpur.
Sagwara.
Galliakot.

8. *Jaipur.*

Jaipur.
Pátan.

Khaudela.
Amber.
Chátsu.
Sanganer.
Sámbar.
Rúpgarh.
Ooniara.
Rámgarh.
Lachmangarh.
Síkar.
Fathpur.
Bissao.
Mandawa.
Newalgarh.
Jhúnjhú.

9. *Jodhpur.*

Jodhpur.
Dídwaná.
Mirta.
Nagor.
Mundor.
Nadol.
Peepar.
Páli.
Phallodi.
Pokaran.

10. *Jhálawar.*

Jhálrapátan.

11. *Jesulmer.*

Jesulmer.
Báp.
Birsilpur.
Bikampur.

12. *Karauli.*

Karauli.
Mándrel.
Machilpur.

13. *Kishengarh.*

Kishengarh.
Rúpnagar.
Borara.

14. *Kota.*

Kota.
Burrod.

Nahargarh.
Rájgarh.
Sangod.
Sultanpur.

15. *Oodipur.*

Amlee.
Banera.
Bednor.
Bhíndah.
*Chitor.
Dábla.
*Deogarh.
Goosur.
Gungapura.
*Jaházpur.
Koorabur.
*Náthdwára.
Raipur.
Rájgarh.
Rájnagar.
Rashmu.
Rohera.
Sanganecer.
Sawa.
*Salúmbar.

16. *Pertábgarh.*

17. *Serohi.*

Serohi.
Aboo.
Erinpura.

18. *Tonk.*

Láwa.
Nimbera.
Rampura.

19. *Uthwar.*

Uthwar.
Tijára.
Rájgarh.
Lachmangarh.
Nimráni.
Macheri.
Rámgarh.

For a particular description of the principal towns, reference must be made to the Gazetteers of the States to which they belong.

Fortresses.—The forts and castles of Rajputana are numerous, and often exhibit the best specimens of the architecture of this part of India. The great fortresses are still all in the hands of the State Chiefs, but every considerable landholder possesses a stronghold; in Meywar some of these are very defensible against native forces; and in Jaipur and Jodhpur there are several of material strength and striking appearance. The oldest are probably those which, like Tárargarh above Ajmer, and Chitor in Meywar, have been constructed by running massive stone walls round the summit of flat-topped, precipitous hills, the highest in the neighbourhood, the adjoining hills being connected with the main enceinte by long lines of minor outworks. The area thus fortified often incloses a large space, with palaces, temples, tanks, and a great many houses for troops and followers. The plateau inclosed by Chitor is about three miles long and from a half to three-quarters of a mile broad; its highest elevation may be 800 feet. This fort contains two famous *Taistambas*, or pillars of victory, of great architectural merit. Tárargarh is small in area, but stands some 1,400 feet above the plain at its base. Some of the largest of the hill-forts lie in or among the Arvalis, and to this class really belongs Tárargarh, with the northern forts of Ulwar, Jaipur, and Khetri, for the hills on which they all stand are part of the Arvali system. Further south-west are the great Meywar frontier forts of Kumalmer and Gogúnda, commanding the passes of the main range. Kumalmer has an elevation of about 3,800 feet above the sea. Bhainsrorgarh, Mándalgarh, and Indargarh are strong forts among the hills about the Banás and Chambal. Jesulmer, Bikanir, and Jodhpur have all their fortresses; the Jodhpur fortress is, in its way, the finest in Rajputana, standing on a sandstone hill rising nearly 500 feet above the level of the flat plain in front of the town, looking down upon it from a sheer face of hewn rock, and crowned by a palace which combines massive construction with singular beauty of some details. The main access is up a steep, paved road, covered by six successive gateways, beside the inner gate leading into the palace. Jaipur has one fort overlooking the modern town, with great extent of circumvallation; and Amber on the same ridge, four miles distant from the town, is more like a château of the sixteenth century than a fortress. Búndi has also a fort perched above its romantic château. Kota is surrounded by massive stone walls and bastions built by Zálím Singh; and Gagron, on the Káli Sind in Jhálrapátan, is a fine fortress. Rintham-

bar is a famous stronghold on the Eastern Marches, at the confluence of the Banás and Chambal. Both these last-mentioned forts possess much historic association, being frequently mentioned in the chronicles of the struggle between the Rajputs and Mahomedans for dominion over the districts which they command.

SECTION VIII.—RELIGION.

Under this heading it is necessary only to mention characteristic and local peculiarities. The vast majority of the people are Hindus, with a very strong infusion of the Jaina sect. The Rajputs, though very superstitious, are neither remarkable for devotion, nor for over-fastidiousness about caste rules and sacred personages, wherein indeed they resemble rough, pugnacious, free men all the world over; but they worship at famous shrines, and do what is proper on the great Brahminic feast-days. They are much given to the *cultus* of divinised ancestors, as, for instance, of Mallináth, the eponymous ancestor of the elder branch of the Rahtors; and they have had among them one or two spiritualists who have left a doctrine and a following. The very large Oswál division of the Jainas took its origin from a Rajput convert at a village in Marwar.

Of local sects that are most in vogue may be mentioned the Dádu Panthis, whose head-quarters are in the Jaipur State, to whom belong the armed Nágas; and the Ram Sneh sect, which prevails most in Marwar and Meywar, with its head-quarters at Shahpura. Each sect has its special book of the precepts left by its founder, and its Chief for the time being is supposed to be the inheritor and transmittor of the special grace and divine insight acquired by his spiritual ancestor. They do not pretend to work miracles or communicate with the gods so much as to show the way of life and to deliver a mystic message. The disciples, or religious order within the sect, must be distinguished from the body of laymen who follow the peculiar teaching and observe its tenets. There has also sprung up of late years a noticeable tendency toward secret rites and societies, and toward spiritual independence personally. The secret societies, being given to demon worship and nameless orgies, are called by a name which indicates departure from the straight road. The new mystic sects disown caste prejudices and the orthodox priesthood. Even among the Bhíls has arisen of late years a prophet, and it has been said by a very good observer of the outlying tribes, that, with a distinct surface drift toward orthodox Hinduism, they are also subject to an under-current that sets against prejudices and Brahminism. The reli-

gious condition of the people in the backwoods and the jungles has hitherto been the usual indistinct confused medley of grotesque superstitions, adoration of deceased heroes and saints, and propitiation of every ascertained manifestation of divinity.

Of famous temples and shrines belonging to orthodox Hinduism may be named the shrines at Náthdwara and Kankraoli in Meywar, belonging to the Vallabacharya sect of the worshippers of Krishna; another much-frequented Vishnoi shrine in the Arvalis above the Daseri pass leading into Marwar; the Sivaite shrine of Eklinga near Oodipur; and the great temple of the Náths at Jodhpur, where are preserved the footprints of Goruknáth. There are numerous annual gatherings round the shrines of saints and deities of local celebrity. At Rikabdeo, in the south-west of Meywar, is a famous shrine of the Saraogis; and the temples on Mount Aboo are much resorted to by Hindus as well as Jainas (to whom the great temple belongs) on pilgrimage. Most of these shrines are held and managed by celibate orders of devotees, who recruit their numbers by receiving children vowed to the deity, or taken in by charity. The administration is in the hands of a sort of abbot, often a powerful personage with large jurisdiction, sometimes the spiritual director to a ruling Chief. Some of the shrines have considerable landed endowments, and draw also a great income from money offerings; their managers occasionally advance money on landed security.

Ajmer contains the tomb of a renowned Musalman saint, where Musalmans assemble from all parts of India on his commemoration day. The Hindu tribes who have been from time to time converted to Islam in the rural districts are now becoming more orthodox and regular in their practice, having hitherto preserved a curious mixture of Hindu customs and worship with Musalman beliefs.

Astrology is universally practised, and a professor must be consulted at all critical conjunctures, political or social. Witchcraft still has tremendous power; and very few ruling Chiefs can resist the dread of what is really feared as a most dangerous method of secret assassination. Among the wild Bhíl tribes the terror of it has fostered, as formerly in England, the profession of witch-finding, and horrible barbarities, which the English officers are gradually suppressing, are practised on those who are denounced.

The resources of self-mutilation, suicide, or killing of women, and the milder devices of *Dharna* in order to resist or enforce a demand, are much in vogue among the more barbarous sects of devotees, especially when taxes are demanded or grants of land resumed.

SECTION IX.—INDUSTRIAL OCCUPATIONS.

The mass of the people is occupied in agriculture, which will be treated in a separate section. In the large towns, banking and commerce flourish to a degree beyond what would have been expected for so backward a country. In the north, the staple products for export are salt, grain, wool, and some cotton. In the south, the great article of export is opium, and secondly cotton; the imports consisting of sugar, hardware, piece-goods, and the usual miscellaneous things needed by a country with no manufactures on any scale. Salt is made very extensively in Jodhpur and Jaipur from the great salt-lakes, which are the most valuable possessions of the northern States, and in Bhartpur from the brine wells. From the great plains north of the Arvalis, especially from the Shekhawati country, comes the wool, and from these pasture-lands a great many sheep are driven annually to Bombay. The cotton is grown in the midland and eastern districts; while the rich, well-watered black soils which send opium to Malwa are owned by Meywar and the south-eastern States, by Kota and Jhalawar in particular.

The head-quarters of banking and exchange operations may be said to be Jaipur, the largest and richest city of Rajputana, though the principal firms of Malwa and of the northern cities of British India have agencies in most of the towns. The employment of capital in Rajputana is becoming less productive, and is diminishing since the peculiar sources of profit formerly open have been disappearing. At the beginning of this century large commercial speculations had more the character of military enterprises than of industrial ventures, when the great insurance companies remitted goods or specie under armed companies in their own pay, and when loans were made at heavy interest for the payment of armies or the maintenance of a government. The railways and telegraphs are gradually levelling profits on exchange and transport of goods; while the improved prosperity and stability of the States render them more and more independent of the financing bankers. And since capital does not yet, as in British India, turn to land for investment, it is apt to seek employment in the more forward countries elsewhere. Of course there is an immense deal of petty money-lending to the peasantry.

The largest commercial fairs in the country are for cattle, camels, and horses at Pokar near Ajmer, and at Tilwara in the Jodhpur State.

Of manufactures Rajputana has no speciality, unless the making of salt be included under this head. In Bikanir they make some fine woollen cloths, and they work in leather

very well throughout the northern States; at Páli in Jodhpur is a particular dye, much employed, the brackish water of those parts being good for dyeing; and at Serohi the steel weapons are good. In the finer and more artistic manufactures, however, Rajputana takes a high place; small capital towns under Chiefs who take a hereditary pride in decoration and ornament appear always to favour the development and preservation of art. The enamel-workers of Jaipur produce beautiful things by a process of which the secret is unknown elsewhere. In Pertábgarh they have a peculiar enamel of gold on glass; while at Ulwar and some other capitals the goldsmiths and silversmiths have acquired superior skill in workmanship and design, under the patronage of the Courts. But art, with all that is most exquisite and original in Rajputana, is in imminent danger of obliteration under the influx of grotesque travesties of European designs and fashion imported from Calcutta or Bombay.

SECTION X.—LAND TENURES.

The characteristic of land tenures in the Rajput States proper, in the west and south-west particularly, is, that a very great proportion of the land is held on freehold tenure by the kinsmen and clansmen of the chief and by other clans of Rajputs. The word "freehold" is here used to denote the holding of a free man by service not unbecoming his birth, and under payment of the customary share of the produce of the soil in which chief and clan are coparceners, the "fruits of worship," as it is devoutly expressed. There are also, here and there, some assignments or grants of land of the nature of *jágirs* proper,—that is, the revenue was allotted to certain persons merely as a convenient way of paying the estimated actual cost of civil or military establishment or services. All large estates are held under implied condition of keeping up the police within their borders, protecting traffic, preventing heinous crimes, and pursuing offenders hot-foot when the hue and cry is raised, or when the tracks of flying brigands are run into the boundaries. In some parts of the country the estate passes in block to one heir, and others are entitled to maintenance; in others the tendency to divide the land as the family increases and branches out is more marked; while in other parts division among brothers is imperative, and of course the *morcellement* of the freeholds is in proportion as the custom of sub-dividing the land among the clansmen may prevail.

Taking all the Rajput States together, the extent of land thus held in cultivating freehold must be very large; in Kerauli there

are whole villages belonging to the clansmen, who pay nothing to their chief; but the freehold tenures are probably most extensive in Marwar, Jesulmer, Bikanir, the north of Jaipur, and in part of Meywar, a light quit-rent being usually paid. The smaller plots of what may be called freehold land are usually held on the *bhûm* tenure, which is thought, on the whole, a better title than any, because the *Bhûmia* and his heirs hold for ever on condition of some peculiar service, such as watch and ward, guard of the roads, or attendance at specified occasions, and are not, like the petty kinsmen and clansmen of a family chief, portioned off-upon lots of the family domain which might be resumed if the chief and his folk quarrelled. Some of the groups of cultivating Rajputs who hold on the *bhûm* tenure have occupied from time immemorial, paying, not rent, but customary rates and services, and are very proud of having held the land before its conquest by the ruling family. All these freeholding classes are distinct from the mass of cultivating peasantry, and their existence has been very generally overlooked in accounts of Indian land tenures; though the dilapidated remains of the clan system appear all over Northern India, and in some parts, as in Oudh, it has only very recently been destroyed.

In the Mallâni country, and generally where the clans are among the cultivators, a man's rent-rate depends upon his descent or kinship; and a Rajput or Châran would as such pay less than a Jât or a Kunbi, while the customary rate or share in kind cannot be increased. Consequently the chief and great feudatories are apt to portion off their kinsmen on the inferior lands. There are large perpetual assignments to shrines and temples, while sacred castes, like the Brahmins, Chârans, and the groups of cultivating devotees which are here and there found, hold at privileged rates. The constant alienation of *khâlisâ*, or of lands under the Chief's direct authority, either as appanages to kinsmen, or as grants to religious uses, has produced, and still produces, a material effect upon the State's economy. Over a very large part of the territory of some States the land revenue is either in mortmain or fixed on freeholds at a very low rating, and the treasury is driven to indirect taxation of an onerous and complicated kind.

The cultivating tenures of the peasantry at large are not. In to define accurately, though their general nature is not slight same throughout Rajputana, both in the *khâlisâ* villa- along the directly to the State), and in the great feudatory patel, who is cultivator is understood to have a permanent home, arranges for his holding so long as he pays the rent demarcation of fields, &c.; man is a hard measure; but in a country with the Bhil tracts there exactions of the tax-collectors are held in sometimes a mere

(30)
collector of rents, sometimes the headman of a *Bhíl pál*, or community.

It is generally agreed that in Rajputana, as elsewhere, the great private estates are better managed than the villages directly under the fiscal officers of State, and that the cultivators are better off. Motives of self-interest act more directly upon the *thákur* or *jágirdar*, and the competition between him and the State for tenants is a great check to oppression.

After the freeholding classes, perhaps the strongest and most prosperous cultivating bodies are to be found in Ját and Gujar villages of the north and north-west, where the peasant is occasionally a very substantial farmer, and where large herds of cattle are kept. Pastoral life and the possession of cattle are favourable to independence; the property is moveable, and the owner can live on it all the year round, while the cultivator is tied to his land and must wait for his crops.

SECTION XI.—AGRICULTURE AND SOILS.

Westward of the Arvalis there is a good strip of soil along the banks of the Luni, which occasionally overflows, and on the subsidence of the waters an alluvial deposit remains which yields good crops of barley and of wheat. Excluding the fertile portions of Marwar enclosed with the branches of the Luni, nearly the whole country to the north-west of this river, including most of Marwar, the States of Bikanir and Jesulmer and the district of Shekhawati, is a vast sandy tract. Water is far from the surface and scarce. Irrigation from wells is impracticable, for not only is the supply of water too scanty to admit of it being used for this purpose, but also the depth of the wells usually exceeds 75 feet, the maximum at which irrigation from wells has been found profitable in Jesulmer and Bikanir. The water in the wells is often from 300 to 500 feet below the surface. The people have thus to depend for their supply of grain entirely on the produce of the crops sown in the rainy season, which, in this part of the world, is of very uncertain character. When rain does fall, it sinks into the sandy soils and does not flow off the surface, so that a very small rainfall suffices for the crops. The system of agriculture is very simple, and only one crop is raised in the year. At the commencement of the rainy season, the sand-hills are ploughed by camels, and the seed is then planted very deep. After it has sprouted, a few showers bring the young crop to maturity. As the light camels of the desert walk swiftly, and the ploughs are of

unsuccessful effort to work them which was made about two years ago. At Loaria the ore used to be obtained from four small hills to the south-west of the village. These hills are covered with excavations and holes of considerable length, where the miners used to work. They had formerly several hundred houses in the vicinity—a number which is now reduced to twenty.

Another small iron mine at Motia Undwera is still worked.

Rivers and Lakes.—The Mahi is the principal river in the province, which it enters from Rutlam to the south-east. Thence, running north and intersecting the north-east portion of the State, it turns to the west, and again to the south, forming the boundary between Bánswára and Mewar and Dungarpur. It is a perennial stream and always fordable, except in the rainy season, when the waters rise to a great height. There are no boats on this river in Bánswára, but rude rafts are to be found at most of the crossings during the monsoon. They can ply, however, only when the stream is not at full flood.

The banks of the Mahi are generally between 40 and 50 feet high, and, with the exception of a few barren and sandy spots, are well wooded. Its bed is, as a rule, rocky, but in some places it consists of stretches of sand interspersed with rock and shingle.

Among the tributaries of the Mahi in Bánswára are two very small streams, which flow from the eastward. They are known as the Bhundan and Airav, and neither is perennial. A third and somewhat less insignificant affluent is the Cháp, which flows westward, past the capital, and joins the left bank of the Mahi. These three streams are unfordable in the rainy season, when they discharge a considerable volume of water.

There are no lakes of any considerable size in Bánswára. The chief is the Báí, a fair-sized artificial lake, two miles east of the capital, which has a strong masonry bund or retaining-wall, on the top of which the Ráwal has built a summer-palace. Near many of the villages, tanks are to be seen; they are little better than ponds.

Climate and Rainfall.—No proper meteorological observations have been recorded, but the temperature may be judged from the following readings taken from a thermometer in the verandah of the Bánswára dispensary :—

Summer	. . . . .	92° to 100° Fahr.
Rains	. . . . .	80° to 83° „
Winter	. . . . .	65° to 70° „

The average rainfall for the three years 1873, 1874, and 1875 was 44·33 inches per annum.

No records exist of any severe famine having visited the country, but 1836, 1861, and 1865 were years of scarcity and dearness of grain. The famine of 1869, that devastated so much

of Rájputáná, was not felt in Bánswára. In 1858 the river Mahi overflowed its banks, inundating the neighbouring lands and causing much loss of life.

Guinea-worm, skin-diseases, and ulcerous eruptions are common in Bánswára, but fever is the most formidable and prevalent malady. There is a dispensary at the capital, which works well, and in which a large number of patients are treated.

History.—The history of Bánswára as recounted by a local chronicle is as follows:—

The Ráwals of Bánswára are a junior branch of that family of the Sesodia clan of Rájputs which is now ruling in Dungarpur, from which they separated about the year 1530. At that period, and for very many years previously, the whole country which now comprises the two States of Bánswára and Dungarpur was known as Bágar, and was under the dominion of the family of Sesodias which still holds Dungarpur, though the chief's control over the lawless Bhíls inhabiting the wilder part of his territory was merely nominal. Udai Singh, who came to power in A.D. 1509, had two sons—the elder named Prithvi Ráj, and the younger Jagmal. He himself marched under his kinsman Rana Sanga of Chitor against the Emperor Bábar, and was killed at the great battle of Kanwa in 1528. After his death his territory was divided between his two sons; and the descendants of the two families are the present chiefs of Dungarpur and Bánswára. Whether this division was made amicably or by force is not clear. There is a tradition that Udai Singh ordered it to be made before he died; there is another legend that Jagmal, his son, was left for dead on the battle-field, but recovered, and on returning to his country was disowned as an impostor. Whereupon he took refuge in the hills to the north of the present site of Bánswára, and, having collected a body of followers, commenced to make incursions into his father's territory. This asylum is still known as Jagmer. It is related that Jagmal's first acquisition of territory came about in this wise. In those days there resided to the east of the Mahi river a powerful noble, who hardly deigned to acknowledge the authority of the ruler of Dungarpur. His estate was known as that of Kuanya. With him Jagmal speedily came into collision, and a protracted feud ensued. After harassing each other for a number of years, they at length became reconciled, and, on the death of the old Thákur of Kuanya, Jagmal gained possession of his estate without opposition. Having thus obtained a firm foothold, he turned his arms against the Bhíls, who held nearly the whole of the country now constituting Bánswára. Where the town of Bánswára now stands there was a large Bhíl *pál*, or colony, under a powerful chief named Wasua, and against him

Jagmal directed his principal attack. Wasna was killed during the storming of his *pál*, his followers were routed, and his lands passed into the hands of the Rájput conquerors. The name Bánswára is by tradition said to be a corruption of Wasnwara.

Jagmal now transferred his residence to Bánswára, whence he continued his forays against Dungarpur and the Bhíls. In Dungarpur, Udai Singh had been succeeded by his elder son Prithvi Ráj, and the two brothers, finding their continual border warfare intolerable, agreed to abide by the arbitration of the Rájá of Dhár as to the partition of their lands. Accordingly in 1529 the river Mahi was fixed as the boundary between the two States of Dungarpur and Bánswára, which since that date have remained perfectly distinct and independent of one another.

Other records relate that the chief of Bágar, Udai Singh, divided his territory at the time of his death between his two sons Prithvi Ráj and Jagmal.

The sixth in descent from Jagmal was Samar Singh, who considerably extended his territory by conquest over the chief of Pertábgarh. He was succeeded by his son Kúsal Singh, who was in the field twelve years fighting with the Bhíls, and founded Kusalgarh and other places of note in the province.

In 1747 Prithvi Singh came into power. He fortified the town of Bánswára, attacked and plundered Sonth, and seized the district of Chilkári, to the south-west of Bánswára. Towards the end of the century the whole of this country became more or less subjected to the Marathas, who levied heavy exaction from the chiefs, and whose predatory bands plundered at large; while roving companies of unattached mercenaries harried the lands, and cleared off what the Marathas left.

In 1812 the chief of Bánswára, which was recognized as a separate power, offered to become tributary to the British Government on the condition of the expulsion of the Marathas; but no definite relations were formed with him till 1818, when a treaty was concluded, by which, in consideration of the protection of the British Government, the Ráwal agreed to act in subordinate co-operation, to settle his affairs in accordance with the advice of the British Government, to abstain from disputes and political correspondence with other chiefs, to pay a tribute, and to furnish troops when required. The Ráwal denied his obligation to be bound by this treaty, which had been negotiated by his accredited agent, and was declared to be binding on him, though it was nevertheless thought best, for certain reasons, to conclude a new treaty. This was done in November 1818.

The chief modifications made by this treaty were, that the Ráwal was to pay the British Government all arrears of tribute

due to Dhár or any other State, and an annual tribute not exceeding three-eighths of the revenue; the British Government engaging to bring under control any relatives or connections of the chief who might prove disobedient. By a subsequent treaty the amount of the annual tribute was fixed at Rs. 35,000, and it has since been again raised for special expenses within the State.

The chief has received the right of adoption, and is entitled to a salute.

The Ráo of Kusalgarh holds in relation to the Ráwal of Bánswára the position of a guaranteed or mediatised feudatory, paying tribute for a part of his estate, and bound to render certain duties and marks of feudal subordination. The Kusalgarh lands consist of a compact domain in the south of Bánswára, adjoining Rutlam and Jabúa, inhabited mainly by Bhíls.

Dominant Classes.—In this, as in every other Rájput State, the Rájputs form the dominant class, and the chief nobles represent powerful families belonging either to the ruling Sesodia clan, or to other clans, connected with the ruling house by marriage or otherwise, settled in the territory. In Bánswára there were once sixteen nobles of the first rank, eight of whom, the Sesodias and Chohans, sat on the right of the throne, and the remainder, Rathors, on the left. Of the latter, only three houses now remain.

The Thákurs of secondary rank have no fixed seat in the presence of their chief, and are eighteen in number. All these Thákurs possess in the aggregate 536 villages, and pay tribute, amounting to Rs. 16,126, to their chief. They are all expected to render the usual feudal service to the chief, and do so when called out with their followers for any expedition, or to attend at the capital for the Dasera and Dewáli festivals. On these occasions the first-class nobles receive no allowance, but the second-class Thákurs and their followers are supported at the expense of the State.

The Thákurs of first rank are—

	Names.	Estates.
Chohan	Sardár Singh	Of Molán.
	Balwant Singh	„ Metwala.
	Ratan Singh	„ Garhi.
	Bhajwat Singh	„ Arthuna.
	Kúsal Singh	„ Ganora.
Sesodia	Fateh Singh	„ Khándu.
	Madho Singh	„ Surpur.
	Balwant Singh	„ Kusalpur.
Chohan	Kesri Singh	„ Bankora.
	Udai Singh	„ Takarra.
	Dungar Singh	„ Mandwa.

	Names.	Estates.
Rathor	Ráo Zoráwar Singh	Of Kusalgarh. ✓
	Bakhtáwar Singh	„ Talwara. ✓ A
	Daulat Singh	„ Aorwara. ✓ O

Besides the above, there are some fifteen other minor Rájput families. A brief account of some of the principal families is subjoined.

The Chohans of Molán belonged originally to the ruling family at Ajmer. Mod Pál, the founder of the family, driven from his country, took refuge in Dungarpur, and was rewarded for his services by the chief of that State with the Molán estate on the east bank of the Mahi.

When the independence of Bánswára was established, the Thákurs of Molán transferred their allegiance, and the Dungarpur chief, in retaliation, confiscated the western part of the estate. In 1786 the Thákur of Molán made treacherous overtures to Dhár, on the discovery of which his lands were confiscated by the Court and occupied by its troops. The expelled Thákur, however, gave such trouble that no resistance was offered when he seized again on his possessions.

The Madawat Chohans of Metwala are a junior branch of the Molán family.

This family came into Bánswára from Dungarpur in the middle of the last century and received a grant of land. Additional villages were granted to their descendants for services in the field, and the whole now comprises the Garhi estate. The present Thákur, Ratan Singh, has been given the title of Ráo by the Maharana of Udaipur, who is connected with him by marriage, and the title is recognized by his chief.

The Hathyot Chohans of Arthuna are a junior branch of the Molán family.

The Keringot Chohans came from Bankora in Dungarpur and were granted the estate of Dargar. The Bhíls of that part of the country, however, proved so troublesome that the Thákur had to leave, and was given the Ganora estate.

Khándu was originally taken from the Bhíls by Kúsal Singh, and was bestowed by Prithvi Singh on his second son Bakht Singh, whose great-grandson now holds it. Is in possession of the descendants of Kúsal Singh, the third son of the Maharawal Prithvi Singh.

This estate was seized from the Bhíls and bestowed on a Saktawat Thákur from Bhindi in Mewar.

Bankora. Granted by Prithvi Singh to the Keringot Chohans of Bankora in Dungarpur, and held by their descendants.

Takarra. Is held by a younger branch of the Bankora family.

Mandwa. Also is held by a junior branch of the Bankora family.

The Mertia Rahtors of Talwara came to Bánswára about the time of Ráwal Kúsál Singh, and were granted the village of Gopinathji-ka-Gara, at the western end of the Talwara pass. Talwara is said to have belonged to the Chohans of Metwala, but to have been confiscated.

The Darbár found the protection of the Talwara pass from robbers to be such an expense, that certain lands round Talwara were granted to the Thákur of Gopinathji-ka-Gara, and he was raised to the rank of a first-class noble or *tázimdar*, on the condition of his undertaking the police duties of the pass.

Aorwara is also held by a family of Mertia Rahtors, who came to Bánswára at the same time as the Talwara family.

Official Classes.—The officials and men of influence in the State are mostly residents of Bánswára, whose ancestors have served in office for many generations. Very few foreigners are employed, and those who are, hold subordinate positions only. When Bánswára was first separated from Dungarpur, the new rulers were accompanied by several Nima Banyas, who held all the posts of importance under the new Government; but the influence of their descendants has declined, and they have now gone back to commerce. They were superseded in the departments and offices of Government, first by Nágar Bráhmans, and subsequently by Oswal merchants; but these also have since lost favour, and no special caste is now predominant. Few Musalmáns have risen to distinction in the State, though about eighty years ago one Karim Khan held an important post. There are some ten or twelve families termed *náiks*, who have been in the chief's service for several generations, generally filling the office of kotwal in the city. Two or three hold estates, but they are mostly in the army.

The two family-priests of the Ráwal are Chobisa Bráhmans, whose ancestors came from Chitor, the ancient capital of Mewar, and accompanied Jagmal when he left Dungarpur. The family deity of the chief has a Bráhman attendant whose ancestors have held the post for generations; and the Court historian is a Bhat, who resides in Mewar and whose office is hereditary. The influence and position of the Bhils will be noticed further on.

As in Dungarpur, the villages are classed under three heads :

(1) Khálsa.

(2) Jágír.

(3) Khairát, or religious and charitable allotments.

But in Bánswára there are, besides, several villages held by Bhíl chiefs which pay tribute and not revenue.

The following table will show the general distribution, and amounts of revenue and tribute. The revenues of the Crown villages are collected by the kámdár or his agents, and those of the Zenana and the Privy Purse by special agents :—

Statement showing the distribution of the villages in the Bánswára State.

	Number.	Approximate Revenue.	Tribute.		
		Rs.	Rs.	A.	P.
Khálsa or Crown villages	488? 478	(Not known.)			
Jágirdár or Thákurs' villages. . . .	✓ 536	2,80,000	16,126	15	3
Villages held by Bhíl Chiefs, namely—					
Dulla Ráwut of Sondalpur	20	...	2,139	0	0
Únkaria Ráwut of Mauri Khera	18	...	501	0	0
Khuma Rat of Baregaum	2	...	490	0	0
Religious endowments { Villages held by Chárans and Bhats	36	...	.....
{ Villages held by Bráhmans	22	4'4 75? 22,000	.....	
Villages set apart for the Maharawal's privy purse	✓ 24	22,000	.....	
Villages set apart for the Zenana	21	23,000	.....	
Villages held by officials	4	3,370	1,126	8	0
Total number of villages in Bánswára	1,161	3,28,370	20,383	7	3

Crops.—In the rainy season the following crops are sown :—Indian-corn, múng, arad, til (sesamam), rice of seven kinds, and kudra,—the principal being Indian-corn, rice, and kudra (kodo).

Winter or spring crops are wheat, barley, gram, and sugar-cane.

Opium is cultivated, but in small patches and to no great extent.

Agriculture.—When land is first cleared for cultivation, the trees and shrubs are cut down and strewed over the ground, where they are left to dry till the end of the hot weather, and then burnt. After the first fall of rain the land is ploughed and sown with rice the first year, til the second year, and maize the third. This is the well-known *walra* system of cultivation, so universal among the Bhíls as among all the half-wild tribes in the woodlands of India. In Bánswára it is mostly practised to the north and east of the State. Elsewhere land is ploughed twice, after which the clods are broken up by a heavy beam of

wood dragged over the field by a pair of oxen. When this operation is completed, seed is sown in rows by being run through a hollow bamboo fixed to the plough behind the share. Except Indian-corn, gram, and wheat, all grain is sown broadcast. Rice is transplanted successfully. In the western districts near the Mahi river the soil is said to be sufficiently fertile to produce crops of wheat, sugarcane, and opium without watering.

Irrigation.—Land is irrigated principally from tanks and wells, and, near the banks of the Mahi, from that river. Fields are usually not enclosed.

General Revenues.—The subjoined Statement A exhibits the receipts and disbursements of the Bānswāra State for the year 1873; and Statement B is the trade return for the same year.

A.

Statement of Receipts and Disbursements of the Bānswāra State for the year 1873-74.

RECEIPTS.	Amount in Salum Sahi rupees.		DISBURSEMENTS.	Amount in Salum Sahi rupees.		Amount in Salum Sahi rupees.
	Rs.	A. P.		Rs.	A. P.	
On account of balance of previous years ...	13,428	11 0.	Tribute to British Government ...	50,000	0 0	
Land-revenue including Sawai ...	1,51,364	12 9 ✓	Exchange, &c., on British currency ...	2,500	0 0	
Customs ...	31,847	4 0 ✓	Charity ...	8,361	5 0	
Excise ...	2,938	0 0 ✓	Pay of troops ...	39,153	9 0	
Miscellaneous income ...	12,934	15 3 ✓	Kothar (Commissariat) ...	23,512	5 6	
Nazaráná ...	5,407	0 0 ✓	Miscellaneous ...	55,302	9 3	
Civil Court Fees ...	1,476	13 6 ✓	On taláos and wells ...	1,858	0 0	
Criminal Court Fees and Fines ...	10,064	13 0 ✓	Remission to cultivators ...	4,411	3 6	
Fines ...	937	8 0 ✓	Compensatory awards paid in liqui- dation of debts ...	6,267	0 0	
				2,394	8 9	1,93,760 9 0
			Balance ...	.....		36,639 4 6
GRAND TOTAL ...	.....		GRAND TOTAL ...	.....		2,30,399 13 6

B.

Trade Return of the Bānswāra State for the year 1873.

ARTICLES.	IMPORTS.		EXPORTS.		TRANSIT.		TOTAL.		REMARKS.
	Quantity in bullock-loads of three maunds.	Dues levied in Salum Sahi rupees.	Quantity.	Dues.	Quantity.	Dues.	Quantity.	Dues.	
		Rs. A.	Loads.	Rs. A.	Loads.	Rs. A.	Loads.	Rs. A.	Quantity in mds.
Cereals	27,000	16,031 4	25,000	3,875 0	52,000	19,906 4	1,56,000
Ghee	700	787 8	...	...	700	787 8	2,100
Groceries	1,500	731 4	5,000	625 0	6,500	1,356 4	19,500
Mohwa flowers	6,000	750 0	...	...	6,000	750 0	18,000
Salt	15,000	1,200 0	15,000	1,200 0	45,000
Piece-goods	200	579 4	...	...	1,000	1,750 0	1,200	2,329 4	3,600
Utensils	35	262 8	35	262 8	105
Cotton	200	150 0	200	150 0	600
Sugar	300	450 0	300	450 0	900
Opium	350	1,575 0	350	1,575 0	1,050 ✓
Al or dye-wood	4,000	500 0	4,000	500 0	12,000
Oil	600	187 8	600	187 8	1,800
Timber	Carts 300	375 0	...	...	...	375 0	...
Tobacco	2,000	2,000 0	...	...	...	...	Loads 2,000	2,000 0	6,000
Total	2,200	2,579 4	35,200	18,675 0	51,485	10,575 0	88,885	31,829 4	2,66,655

It must be explained that in Bánswára the collection of revenue is on a system even more irregular and arbitrary than usual. It has got overlaid by abuses which originally were engendered out of the confusion and distress caused by the incursion of predatory bands and the exactions of Maratha leaders. After the causes ceased, the effects remained, and the cultivators are still liable to various indefinite demands; they are also incessantly required to satisfy other calls supposed to be occasional or emergent. When a chief dies, a tax must be levied on the villages to defray the expenses attendant on the investiture of his successor. When he marries, or any of his children are given in marriage, a like demand is made. Similarly, to every extraordinary expense of the State the cultivators are compelled to contribute. All these uncertain and unlimited taxations keep up fraud and concealment on one side to resist extortion and violence on the other.

Land is not measured, nor is it rented at a fixed rate for each bigha as in Malwa, but the amount of collection is adjusted usually as follows :

At the time of the autumn harvest, the headmen of villages, attended by some of the respectable inhabitants, appear before the officials. After some discussion, and comparison of the produce of former years with the actual condition of the villages, the sum to be paid for the whole year is determined, and a written agreement to pay it is given by the cultivators.

The collection of the money rent for the whole year is made after the rain crop at the Dewáli: this cess is termed "*Barár.*" A second levy is made after the spring crop, which is termed "*Kínta:*" this is always paid in kind. The probable outturn is estimated, and the cultivator pays a certain fixed share, varying according to the village custom from one-sixteenth to one-quarter, or sometimes half, the money cesses being raised or lowered according to the quantity allowed to be retained; sometimes the proportion of grain claimed by the State is paid in kind, and sometimes its value is paid in money according to the rates prevailing at the time.

Those places from which money payments are not levied have to yield a third of the crop—a commutation usually allowed to villages that are in an impoverished state.

The other recognized cesses are "*Kuwar Sukri*" and "*Ghora Charái.*"

These are levied at fixed rates per village, *i.e.*, cultivators' villages. None of the extra cesses are levied from the Bhíls.

"*Doria Barár.*"—This is a cess levied solely from Bráhmans who do not pay the annual "*Barár.*"

“ *Kurni* ” is the cess levied from traders and others who do not come under the agricultural cess of *Barár* : it is not devoted to any payment of tribute.

“ *Gari Barár* ” is a levy of grass from villages held by religious sects—Chúrans, Bhats, &c., who pay no *Barár*.

The cess called “ *Dungah* ” is not now levied in Bánswára. It was levied in the olden days to pay the Maratha and other hordes which scoured the country, but it has now died out.

There is also an extra cess called “ *Warian* ” levied on sugar-cane cultivation, at the rate of from $2\frac{1}{2}$ to 4 per 1,000 canes.

Towns and villages are taxed under all, or less than all, of these heads, and their rating under each head is fixed according to their size and capability. The headmen allot to individuals their respective shares, which in the case of cultivators are determined by the extent of their land, and in the case of other classes by their means.

The Patel exists as an agent on the part of the village for settling accounts with the officials, and for managing cultivation ; but he has no rights or privileges ; and there are no hereditary village officers. The Gomethi is, or was, a man who had interest enough to get himself appointed to one or more villages with the business of looking after the collections, and the right to realise a salary for himself and subsistence for his retainers out of the villages, over and above the revenues due. He held his post at the chief's pleasure, often did not reside, but sent a deputy ; his office was a job and a burden to the cultivators. The collection of revenue is now superintended by the thánadars, of whom mention will be made hereafter, and the term Gomethi is applied to the headmen of Bhíl villages only.

Revenues proper are received from the khálsa fiscal villages, only jágírdárs and Bhíl chiefs paying tribute.

Land Tenures.—It is said that prior to British intervention, the estates of the Rájput Thákurs were held upon the obligation of service only, and that the tribute now levied in addition was only imposed to meet the demands of the fixed tribute payable by the State to the British Government. Whether this was actually the case or not, it is difficult to say, but at any rate it seems that service was the chief condition for the holding of land, though the terms of this service were never precisely fixed.

The Thákurs pay “ tanka ” or tribute, and the amount payable has no reference to the rental of the estate, and as a rule appears to be a very small percentage ; for instance, Garhi pays Rs. 3,500 for land worth from Rs. 60,000 to Rs. 80,000.

The terms of service can hardly be defined. In the event of the chief taking the field in person, all the Thákurs are bound to

attend him in person with their followers. If an expedition is sent under some one else's command, the Thákurs need not attend in person, but are bound to send their quotas. They are also bound to attend at the Dasera, or at other times when summoned.

All the Thákurs, great and small, possess full and entire jurisdiction within their own estates. The interference attempted by the Darbár causes the greatest jealousy, and the great Thákurs will not allow their subjects to be summoned to the capital. Hence the difficulty in obtaining the proper punishment of any criminal concerned in either an internal or external case.

All the Rájputés, great and small, hold their lands on obligation for service with tribute: there are no cultivating classes of Rájputés in any khálsa village. Some of the Thákur's retainers cultivate land assigned them by the Thákur, but for this they render service alone.

Land is sometimes held in *bhúm*; for instance, the Ráo of Garhi says he holds the estate of Nowagaum on *bhúm* tenure; that it was granted to the family by the Darbár on account of his ancestor Agar Singh having been killed while attacking the place by the Darbár's orders. The Ráo states that he holds this estate free, and that though all his other estates may be, confiscated, Nowagaum can never be taken from the family. Some other Thákurs may hold land on a similar tenure, but such instances are rare.

In cultivators' villages the headman is called Patel. He belongs as a rule to the most well-to-do family in the place; but the succession is not necessarily hereditary, though as a rule it is generally given to some member of the family.

In Bhíl villages, though, this is a necessity. The succession must be confined to a member of the family, the son or the brother, as the case may be, the post having been hereditary for generations back. The headman of a Bhíl village is called Kúntia, or sometimes Grásia or Ráwut. The headman's *hák* consists principally in the fact that he and his family are free from the payment of rent; that is to say, if the village is rated at Rs. 200, the Patel will collect all this, and may be a little more, from the other villages. He himself pays nothing. He has also certain rights at weddings, &c., besides some small tithe on the produce.

In the Patel's villages his brothers and relations pay their share of the "*Barár*," but in Bhíl villages the entire family is exempt.

In villages held by a considerable Bhíl chief, he sometimes collects from all the cultivators, and at times takes a lump sum per village. The Sondalpur chief, for instance, has certain villages directly under himself in which he collects his own rents at so much

per house. Other villages of his estate are under "Kúntias" belonging to Dulla's own family, and they collect their own rents, paying a certain fixed annual sum to Dulla Ráwut.

As in Dungarpur, the land is parcelled out into small plots called *bantahs*. Each *bantah* consists of two, three, or more fields, and its extent is known by the number of ploughs it employs. Each cultivator tills the plot that he has inherited; and he is very rarely, if ever, deprived of his land, which he looks upon as his inviolable possession, and nothing but want or force will make him leave it. This right survives even should he have quitted his village and return after many years; the temporary occupant will restore the land to him. Immemorial custom has refused its sanction to the sale of land by the cultivator, though there is no actual rule on the subject. Rare instances of dispossession by the State have occurred, but are always excused by the allegation of some gross misconduct or crime on the part of the ryot.

Similarly, all lands granted by the State as religious endowments are inalienable by the possessors, and it is difficult to discover an instance of such grants ever having been resumed. With regard to the Thákurs' estates the case is different. Numerous instances could be cited even in Bánswára, in which the chief has exercised his right of resumption. It should, however, be borne in mind that the resumption of a Thákur's estate does not imply any alteration in the minor tenures upon which the lands are cultivated. The same cultivators continue to till the same plots, though they pay their rent to a different master.

Population.—The entire population of the State has been estimated at 150,000, but no trustworthy statistics are available for correct computation, nor for ascertaining the relative proportions of the Hindu, Muhammadan and Jain sections of the community. The Bhíls form the majority of the population, while the inhabitants of the chief towns are mostly Hindus of the trading classes, Musalmáns, and Rájputés.

In the capital itself, including children and adults of both sexes, there are—

Bráhmans	.	.	.	.	.	1,291
Rájputés	.	.	.	.	.	150
Trading classes	.	.	.	.	.	1,076
Hindus	.	.	.	.	.	1,666
Musalmáns	.	.	.	.	.	2,014
Total						6,197

Castes, Clans and Tribes.—In the Bánswára State there are twenty-two sub-castes of Bráhmans. Of the Rájput clans, the Sesodias have eight sub-divisions, and the Chohans eleven. There are besides fifteen other families of minor note.

There are fourteen classes of bankers and traders, and twenty-eight crafts.

The Musalmáns are comparatively few. The Bhíls form the most numerous section of the population of Bánswára. The country was originally conquered from them, and even now they only own the supremacy of the Darbár so far as the payment of tribute is concerned. Their most powerful chiefs are now Dulla Ráwut of Sondalpur, and Únkariá of Mauri Khara, who possess regular domains in which their authority over the land and the people is recognized. There are other influential headmen of separate *páls* or villages. In these Bhíl tracts the actual power of the Bánswára State to enforce orders or to punish recusancy is very limited, though they are all nominally subject to Bánswára jurisdiction. The State has no power of interference in their villages. In addition to the possessions of these chiefs, several Bhíl *páls* are scattered over the country in which the ruler possesses little authority. The headmen (called Gomethis) pay tribute at the stated period, and for the rest of the year are left much to their own devices. All Bhíls go about armed with the tribal weapons, bow and arrows ; except the headmen and others of consequence, who carry swords. They are a dirty race. The men wear their hair long, and hanging in uncombed masses over their shoulders. Their women are small and ugly, those of rank being distinguishable by the number of brass rings on their legs, often extending from the ankle to the knee. They kill and eat kine, and are much addicted to spirits, vast quantities of which are consumed on festive occasions, which frequently end in quarrels and bloodshed. Fond of fighting, they resort to their weapons on the slightest provocation, but their most serious affrays arise out of cattle-lifting and the abduction of women.

If a Bhíl runs away with a betrothed girl, a feud will frequently ensue, which will not end till the villages of both sides have been burnt and many lives lost.

As a rule they keep tolerably quiet in the winter and the rainy season ; but in the summer, between the gathering-in of the last harvest and the sowing of the next, they begin raiding on each other ; and even the richest think this time, which hangs heavily on their hands, favourable for paying off old scores. There are sixty different sections of the Bhíl tribe in Bánswára.

Marriage Customs.—Bhíl children are not betrothed by their parents in their childhood. A Bhíl girl is often unmarried up to the age of twenty or twenty-five. Her father can take no steps of his own accord for his daughter's marriage : were he to do so, suspicion would be aroused that there was something wrong with the

girl. His friends can take steps on his behalf, but he himself must wait for a proposal from the father of some eligible lad, which he can entertain or not as he pleases. Should he accept the proposal, the lad's father, having provided himself with a couple of *gharas* (earthen pots) of liquor, will return to complete the ceremony of the *sagari*, or betrothal, sitting down under some large tree or other cool spot in the village. The girl's father and his friends join them, and the question as to the amount of money to be paid by the father of the lad to the father of the girl is there and then disposed of. This amount varies, according to the means and status of the parties concerned, from Rs. 30 to Rs. 60. When this is settled, the father of the boy makes a cup of leaves of the *dák* tree, and, placing it on the top of the *ghara* of liquor, puts inside it two annas worth of copper coin. The girl's brother, or some other boy among her relations, then takes the coin and turns the cup of leaves upside down. The betrothal is then complete; and nothing remains but to drink the liquor, which is done on the spot. The girl's father then kills a goat and gives a feast to his future son-in-law and his father, after which the latter return home.

Some four or six months after the betrothal, arrangements for the wedding are set on foot.

The boy's father takes a present of clothes, a sari, a petticoat, and a corset for the girl, who at once puts them on. Her father if well off kills a buffalo, if poor a goat, and gives a feast to all the village, and to the boy's father and all his friends. On this occasion a Bráhmaṇ is called in, and, on the receipt of four annas from each father, fixes some auspicious day for the wedding.

Half of the amount previously fixed upon is now paid to the girl's father in cash, and the remainder in kind, in the shape of a bullock, &c. On the day fixed by the Bráhmaṇ for the wedding, the boy, after being well anointed with *pít*—a mixture of turmeric, flour, &c.—proceeds to the girl's house, accompanied by all his friends and relations. They halt at the borders of the village, whither the girl's father with all his friends, and accompanied by drummers and women singing, proceeds to meet them, and after performing the ceremony of *Talak*, i.e., marking the boy on the forehead with saffron, escorts them into the village, and settles them down under some large tree or in some other convenient spot. The girl's father then returns to his house, and the boy's father pays certain customary dues.

On the evening of the wedding-day a great feast is given by the bride's father; and the bride and bridegroom are provided with a separate hut for the night, while their friends get drunk. Next morning the bride's father presents his daughter with a

bullock, or a cow, or with any worldly goods with which he may wish to endow her, and, after presenting the boy's father with a turban, gives him leave to depart.

Funeral Rites.—The following are the ceremonies said to be observed by the Bhíls on occasions of death. When a man dies a natural death, his corpse is covered with white cloths, and a supply of food in the shape of flour, clarified butter, and sugar uncooked (called *sára*), is placed by his side for use on his journey to the next world. They are afterwards thrown into the water by the side of which he is burnt.

A small copper coin is also thrown on the ground when the corpse is burnt, apparently as a sort of fee for the use of the ground for the purpose. Three days after the body has been burnt, the ashes are thrown into the water, and a cairn is raised on the spot by the people present, who wring out their clothes over the stones after bathing. On the twelfth day after death, all friends, far and near, assemble for the *Kútá* or mortuary feast, for which the deceased's heir, if well to do in the world, will have provided some Rs. 200 worth of spirits. In the morning the ceremony of the *Arad* is commenced, and lasts generally throughout the day.

The *Bhopa*, or witch-finder of the village, is seated on a wooden platform, and places near him a big earthen pot with a brass dish over the mouth of it. A couple of Bhíls beat this with drum-sticks, at the same time singing funeral dirges. The spirit of the deceased is now supposed to enter the heart of the *Bhopa*, and, through him, to demand whatever it may want. Should the man have died a natural death, the spirit will call for milk, ghee, &c., and will repeat through the *Bhopa* the words he said just before his death. Whatever is demanded is at once supplied to the *Bhopa*, who smells the articles given to him and puts them down by his side. Should the deceased have met with a violent death, the *Bhopa* generally calls for a bow and arrows, or for a gun, whichever the deceased was killed with, and works himself up into much excitement, going through the motions of firing, shouting the war-cry, &c. The spirits of the deceased's ancestors are also called up by the *Bhopa*, and the same ceremonies are gone through with them. In the evening the Bhíl *Jogi* appears on the scene and goes through various ceremonies. He is first of all provided with 12 seers of wheat-flour and 5 seers maize-flour, which he places in front of the deceased's bier. The *Jogi* then plants his brass image of a horse on the top of the flour and sticks an arrow in front of it, and also some small copper coin. Two empty jars, the mouths tied up one with red and the other with white cloth, are also

placed by him in front of the horse. A rope is next tied round the horse's neck. The Jogi then calls out the names of the deceased's ancestors, at the same time signifying to the heir that now is the time for him to give alms or religious grants to the memory of his father or ancestors, which appeal is generally responded to and a cow given to the Jogi. The heir after this directs the Jogi to provide the deceased with food.

The Jogi cooks some rice and milk and pours it into a hole he has dug in the ground. He also pours in a ewerfull of liquor and drops in a copper coin, and then fills up the whole again with earth. Other mystic rites follow: the heir makes presents to the Jogi, and the family friends give presents to the heir. The ceremonies conclude with some hard drinking.

The next day the relatives of the deceased give a feast to the village, each relation providing something towards this feast—one rice, another ghee, and so forth. The honor of providing a buffalo belongs to the deceased's son-in-law, and, failing him, the brother-in-law or the brother. The deceased's widow, if young, is now asked by all the relatives whether she wishes to remain in her late husband's house or to be married again—a ceremony called *Natra*. If she, as she generally does, wishes to be married again, she replies that she will return to her father's house.

If the deceased has a younger brother, he will at once step forward and assert that he will not allow her to go away to any other man's house, and, going up to her, he throws his cloak over the widow, who thus becomes his wife, and is taken away by him to his house there and then. Eight days afterwards, when she is supposed to have done mourning for her late husband, her new husband supplies her with a set of armlets in the place of those given by her former lord, which are taken off. The *Natra* is then complete.

The younger brother is not, however, compelled to keep his brother's widow, should he not wish to do so; but it is such a point of honour that a boy even will claim and exercise the right.

Should the deceased have no younger brother, then the widow is taken away by her father or relations eight days after the *Kátá*.

She will remain at her father's house for a month or two, when either she will be given away in *natra* to some man by her father's consent, or she will run off and take up her quarters in some man's house without his consent. The man she flies to may not wish her to come, and may have no idea of her intention to do so, but nevertheless, once she has placed herself under his protection, he is in honour bound to keep her, and she remains as

his wife. The widow can go to any man she pleases, provided he is of a different caste to her father.

Should the father have given his widowed daughter away in *natra*, her late husband's heir will at once pick a quarrel and demand satisfaction from him. As a preliminary step, the heir generally attacks the widow's father and burns down his house, after which, in course of time, a punchayet is generally appointed to settle the dispute, when a sum of money varying from Rs. 50 to Rs. 200, according to the means of the parties, is awarded to the heir in compensation. The father will then, in his turn, demand repayment from his son-in-law, and should the latter refuse to pay up, he proceeds to burn down his house and make himself otherwise objectionable till his claim is satisfied. Should the widow run off, as she generally does, without her father's or relatives' consent, her deceased husband's heir will at once attack the man to whose protection she has gone.

Should some unmarried and unbetrothed girl take a fancy to, and run off with, some young man, her father and brothers, as soon as they have found out where she has gone to, at once attack and burn his house, or, in the event of their being unable to do that, they burn any house in the village which comes handy. This most probably is resented and retaliated, and the quarrel may be prolonged for some time, but, as a rule, a punchayet is sooner or later appointed to settle the dispute. The compensation awarded to the girl's father never exceeds Rs. 100.

A hole is dug in the ground and filled with water. The girl's father and his son-in-law then each drop a stone into it, and their quarrel is finally settled.

The punchayet and party then consume some liquor at the son-in-law's expense and depart in peace.

Should an unmarried and unbetrothed girl refuse to run off with a man when asked to do so, the man will generally shout out in the village that he has taken so-and-so's daughter's hand, and woe to him who dares to marry her. A punchayet is then assembled, and the father generally gives his daughter to the man, receiving double the compensation that would have been awarded had the girl consented to marry him in the first instance.

Should a girl unmarried, but who has been betrothed, run off with somebody else, the man to whom she was betrothed at once attacks, and possibly kills, the man whom she has run off with, and burns both his and the girl's father's huts. The quarrel often goes on for years and leads to retaliation, till the entire village community on either side are drawn into the quarrel and turn out and attack each other.

Should a wife run away from her husband to somebody else,

the injured husband and his friends often burn the whole of the village in which the recipient of the faithless wife's favours lives. Eventually, when a punchayet is formed, the wife is often given up, and taken back by her husband, any children that she may have borne in the meantime being left with their father. Should the man refuse to give her up, then some Rs. 200 is awarded to the husband in compensation by the punchayet, not to mention the liquor required by the latter during their consultation.

The Bhíls erect stone-tablets in memory of their male dead (never to deceased women), and, as a rule, the figure of the deceased is carved on the stone. He is often represented on horseback with sword, lance, or shield; sometimes on foot, but invariably clothed in the best of long-clothes and armed with a sword and shield—a style of dress he was quite unaccustomed to in the flesh.

Tablets are also erected to boys who have died while still minors; but instead of a figure of the deceased, a large-hooded snake is carved on the stone.

Judicial System.—As in all the backward States of Rájputána, the judicial machinery is of the rudest kind. Civil and criminal courts exist at the capital, but the decisions of the presiding officers are subject to the approval of the Ráwal, to whom they are invariably submitted by the *kámdár*, or minister.

Civil suits in many instances are settled by punchayet—a tribunal that in such cases, and in caste disputes, appears well adapted to the feelings of the people, as the decisions generally give satisfaction. In criminal cases the punishment awarded is usually compensation to the aggrieved party and fine to the State, with imprisonment until the amount is paid or security given. Bhíls were formerly impaled if caught red-handed, but such barbarities are now obsolete, and no criminal can be punished until after proper enquiry and conviction.

The Thákurs exercise civil and criminal powers in their own estates.

For the apprehension of offenders, thánas are established by the State at different places. At each of these there is a thánadar with a small detachment of horse and foot.

Except in minor offences, when the thánadar can impose a fine, his powers are limited to the seizure of criminals, holding a preliminary enquiry, and forwarding the cases to the capital.

In the capital there is a kotwal, who has a few subordinates under him. He is empowered to confine disturbers of the peace, and to report to the minister.

There is no regular jail in Bánswára, criminals being confined in cells or niches in the city-walls near the principal gateway. Imprisonment as a means of punishment does not find

favour. The power of inflicting capital punishment rests with the Ráwal, and is scarcely ever used.

Education.—Education is at a very low ebb: except at a small elementary school at the capital, and occasional private instruction, there is no teaching at all.

Communications.—It has already been stated that there are no made roads in the State. All goods are carried by pack-bullocks. Carts are used for the conveyance of produce, fuel, &c., for short distances between the villages in the western districts, but elsewhere wheeled conveyance is unknown.

There are no traffic routes of any importance through Báns-wára, most of the goods from Rutlam and Malwa passing south through Kusalgarrh. Goods from Pertábgarh in small quantities pass in a westerly direction through Ghátol in the north of the State to Dungarpur; and there is a route from Pertábgarh in the north-east, *viâ* the capital, to Ahmedabad and Guzerát.

There is another route from the capital to Ahmedabad, *viâ* Dungarpur to the west, but this is not so direct as the one to the south-west *viâ* Jhallod.

Post Office.—A post-office has been established in the capital, and letters are sent *viâ* Kherwara. There is no telegraph-line.

Districts, Principal Towns, and Remarkable Places.—Báns-wára, the capital of the State, is a walled city, containing some 6,000 inhabitants. On three sides—to the east, north, and west—the wall is still in a tolerable state of repair, but to the south it has fallen down, and the low ridges, along the tops of which it formerly ran, are covered with dense jungle. Many of the tradesmen's houses are built of stone, with flat-roofed verandahs and stone pillars, but the generality are of brick, and roofed with an inferior kind of flat tile, which cannot keep out heavy rain. Before the monsoon, a layer of leaves is inserted underneath.

The palace stands on rising ground to the south of the city, and is surrounded by a high loopholed wall, with three gates. It has been much altered since its first erection, every occupant having added something to the original structure. Several additions have been made by the present chief, and a tower is now being built at the north-west corner overlooking the city. On the crest of the low ridge to the south of the capital stands a double-storeyed building called the Shahi Belas, built by the present Ráwal, from the top of which a fine view is obtained.

To the south and east lie hills covered with woods. To the west the ground is level, cultivated here and there, and dotted with fine mohwa trees. Long rows of palm trees, backed by thick forest to the north, and to the east the Bái Tal among the low hills, the stream running under the city-walls, and several

small lakes among the mango trees on the plain, complete the picture.

The *chatris* or mausolea of the rulers of Bánswára are in a garden about half a mile to the east of the city, and near a stream of water.

Some old ruins on the top of a hill two miles to the south of the city are said to be the remains of a palace which was the residence of the chief who founded Bánswára. Traces exist of a fortified gateway, of a wall skirting the ridge, and of a brick building with vaulted roof; but the whole place is choked up with weeds and undergrowth.

The villages in the vicinity of the capital are governed directly under Bánswára, and are kept distinct from those in the districts.

Gotara, three miles to the north of the city, is a Gujar village, in addition to which there are two others in the State.

The inhabitants are stated to have emigrated from Mewar.

Bánswára is divided into eight districts, or *tappas* as they are locally called, which radiate in different directions from a small area around the capital to the borders of the State. They are—

✓ 1. Ghanti Utár	. . . . .	W.
✓ 2. Loaria	. . . . .	N.W.
3. Chimda	. . . . .	N.
✓ 4. Bhúngra	. . . . .	N.E.
5. Mahirawára	} beyond the Mahi	E.
6. Panchalwára		
✓ 7. Khánduwára	. . . . .	S.
✓ S. Pathog	. . . . .	S.W.

1. *Ghanti Utár*.—This district, so named from the pass through the hills near Talwara, due west of the capital, comprises all the country to the westward of the pass till the confines of the State at the river Mahi, and contains the following *jágirdár* estates:—Garhi, Arthuna, Bankora, Takafra, Mandwa, and Talwara. The inhabitants are mostly cultivating classes of Bráhmans and patels, and the land almost entirely belongs to *jágirdárs* or the private estates of the Ráwal and the Zenana. Rice, sugarcane, and opium are the staple crops. The soil is black, and is said to require no irrigation.

Partápur, the head-quarters of the district, contains between 500 and 600 houses.

Garhi contains the same number of houses. To the north of this village runs the river Cháp.

Arthuna contains some 400 houses. For a distance of some three or four kos to the east of the village lie the remains of an ancient city called Amraoti, and to the south the ruins of a Jain temple.

Talwara has 300 to 400 houses. There are ruins of several old temples in the neighbourhood, and the village itself is said to stand upon the site of an ancient city, which, as in the case of Amraoti, was founded by Amrik Rájá of Sidhpur Patan. The Talwara pass through the hills is about six miles in length, and ruins of old tanks and temples are to be found in it. In the middle of the pass there is an artificial pool of water said to have been made by Bhim, one of the brothers of Yudishtra, during the famous twelve years' exile.

2. *Loaria*.—This district extends from the “Raman Belás,” a circular building erected by the Ráwal near the village of Chariawasa, three to four miles north-west of Bánswára, to the river Mahi at Loaria. The soil is light ; and rice, which is the principal crop, is grown of an excellent quality. Four villages belong to the Darbár, the rest being inhabited by the cultivating classes of patels and the jágírdárs. The latter have ten estates—Molán, Metwala, Gañora, Galkía, Bhimsor, Bhowasra, Bichiwara, Uniara, Mahiawasa, and Wasi. The town itself is now almost entirely deserted, and the iron mines, which have been noticed before, are now unworked. The chief villages in the district are Paloda, Molán, and Metwala, containing about 300 houses each. Mostly open, it is yet well wooded with mohwa, mango, and other trees.

3. *Chimda* extends northward of Bánswára to the Mewar frontier at the river Mahi.

Indian-corn is the principal crop, though sugarcane is also much cultivated.

Ghátol is a village of some 300 to 400 houses ; and an official resides there who collects revenue and taxes, and has charge of the neighbouring Bhíl villages.

There are six jágírdár estates in the Chimda district.

4. *Bhúngra* extends to the Pertábgarh border to the north-east of Bánswára, and includes the estates of the Thákurs of Simlea and Kusalpúra, and of the Bhíl chiefs of Sondalpur and Mauri Khera. The district is hilly and covered with jungle. Indian-corn is the staple crop. Bhúngra, the largest village, possesses some 200 houses.

5. *Mahirawára*.—This district is inhabited exclusively by Bhíls, who are mostly of the Mahira caste ; hence its name. It extends from the Mahi to the Pertábgarh border.

6. *Panchalwára*.—This district consists of only 12 villages, and lies to the eastward of the Mahi, and between it and the Rutlam border. With the exception of a few Bráhmans, patels, and banyas at the chief village, Panchalwára, the inhabitants all belong to the Bhíl tribe.

7. *Khánduwára* is a hilly district extending from the hills to the south of Bánswára near Fathpura to the Rutlam border. The villages, with the exception of four, are entirely inhabited by Bhíls, and for the most part belong to the Maharaj of Khandu, a relation of the Ráwal. The village of Khandu contains about 700 houses, and is the abode of the Maharaj, whose house is to the south of it on the banks of a stream.

8. *Pathog*.—The Pathog district extends from the village of Tikria, three miles to the south-west of Bánswára, to the Kusalgarh border, and its villages are all inhabited by cultivators, Bráhmans and patels.

The following jágirdárs hold estates in it:—Orwaria, Anjah, Chaja, and Bhukya.

Nangama, Chinch, Wágidora, and Kalijra are the principal villages, the first three having 500 houses, and each of the last 300.

Indian-corn, rice, wheat, and gram are grown.

Fairs.—There is only one fair in Bánswára, which is held in October at the capital and lasts 15 days.

Traders from the neighbouring countries congregate here as well as the people of the country, and the total number of visitors is estimated at 2,000. Opium, Bombay wares, dates, cocoanuts, grain, ghee, and the produce of the country, together with tobacco and the principal commodities, are sold. All customs dues are remitted to traders attending, and a thriving trade is said to be carried on.

A gathering of Bhíls for trading purposes takes place annually at Gotio Ambo, which is locally celebrated as one of the lurking-places of Yudishtra during his exile, but scarcely can be termed a fair of any pretensions. Nothing appears to be manufactured in Bánswára. From Guzerát, cloth, cocoanuts, dates, betel-nuts, pepper, tobacco, and salt are imported, but a large proportion is in transit only to Rutlam. From Rutlam to Pertábgarh, opium, cotton, cloth, and a few other articles are taken through the country to Guzerát and Bombay.

APPENDIX.

KUSALGARH.

The petty chiefship of Kusalgarh lies to the south-west of Bánswára, and in physical features much resembles it.

Near the town of Kusalgarh the country is tolerably open and well cultivated. To the south, along the Rutlam, Jabúa; and Jhalod borders, it is hilly, wooded, and inhabited by Bhíls, who are more tractable than their brethren in Bánswára.

Rivers.—The only streams are the Anas and the Molal. The former flows in a north-westerly direction to the Mahi; and the latter, rising south of, and flowing past, Kusalgarh, empties itself into the Anas. Neither is perennial, but in the monsoon, like most streams in this part of the country, they become unfordable torrents. Both have rocky beds.

Lakes.—There are several artificial lakes in Kusalgarh, but none are of any great size or importance.

Hills.—Nearly the whole province is covered with a net-work of hills, but none are of any height.

Forests.—Most of the hills are covered with jungle, and in the valleys and gorges between them there are small tracts of forests containing large trees of the kinds found in Bánswára,—teak, sadar, and sisam being the most common.

Quarries and Mineral Productions.—There are no mines or quarries. Lime is found near Kusalgarh and at the village of Chitra.

Climate and Rainfall.—The climate, temperature, and rainfall assimilate to those of Bánswára. No statistics on these heads are available.

The famines and severe scarcity which so frequently affect other portions of Rájputáná do not appear to visit these southern portions of the country.

History.—The Ráo of Kusalgarh is a Rahtor Rájput, and claims descent from Jodh Singh, the founder of Jodhpur. Maldev, the fifth in descent from Jodh Singh, acquired possessions near Rutlam at a place called Rauti, east of the present province of Kusalgarh. Maldev was succeeded by his eldest son, Ram Singh. He had thirteen sons styled “Ránawat,” a titular appellation of the ruling family in Kusalgarh to the present day. Ram Singh was succeeded by his third son, Jeswant Singh, and Jeswant Singh by his eldest son, Amar Singh. Amar Singh obtained an estate in Rutlam named Khera, containing some sixty villages, which is still in the possession of the Kusalgarh chief. Amar Singh was killed in an engagement with the troops of Aurangzeb; and Akheraj, a younger brother of Amar Singh, succeeded him. He captured Lalgah, a hill close to the town of Kusalgarh, from the Bhíls, and one tradition says that he, not Kúsál Singh, founded the town of Kusalgarh in the year 1671.

Akheraj was succeeded by his eldest son, Ajab Singh. Ajab Singh had eight sons, and was succeeded by the two eldest, Kalian Singh and Kerat Singh. Kerat Singh was succeeded by his third

son, Abi Singh. After him the succession appears to have gone out of the direct line and to have been fixed by adoption.

In the year 1783, Jalam Singh, who was then ruler, obtained the title of Ráo from the Maharana of Udaipur.

On the death of Jalam Singh without issue, the chiefship devolved on Kámir Singh, who was succeeded by his eldest son, Zoráwar Singh, the present chief of Kusalgarh. He has three sons—Udai Singh, Díp Singh, and Jeswant Singh.

A long controversy regarding the claims of the Bánswára State to submission and homage from Kusalgarh was terminated by a decision of the Government of India against the Bánswára pretensions.

Dominant Classes.—There are eight Rájput Thákurs or jágirdárs in Kusalgarh. Their estates are as follows:—

- | | | |
|----------------------------|---|---|
| Held by Rathor
Rájputs. | { | 1. Tanbesra, 26 villages, worth Rs. 6,000 a year. |
| | | 2. Loharia, one village, worth Rs. 200 a year. |
| | | 3. Bhingarh, one village, worth Rs. 200 a year. |
| | | 4. Jekli, one village, worth Rs. 500 a year. |
| | | 5. Barhwás, one village, worth Rs. 100 a year. |
| | | 6. Kusalpura, one village, worth Rs. 100 a year. |
| | | 7. Rohinya, one village, worth Rs. 75 a year. |
| | | 8. Parnala, one village, worth Rs. 100 a year. |

No. 1 pays an annual tribute of Rs. 500; No. 4 of Rs. 150; No. 2 of Rs. 25. The rest pay nothing, but perform service.

The Kusalgarh officials are foreigners, and mostly natives of Guzerát.

Crops.—The monsoon or rain crops are chiefly Indian-corn, rice, millet of various kinds, and sesamam. The spring crops are wheat, barley, and gram.

Agriculture.—*Walra* cultivation is practised by the Bhíls, and the general system of agriculture is the same as in Bánswára. Much of the soil is a dark fertile loam. The uncultivated area is much larger than the land under tillage. Fields are irrigated from tanks and wells, and water is found near the surface.

Land Revenue.—The village headman, or *turwi* as he is locally called, is responsible for the rent of his village, and collects it. In the month of Kartik he assembles all the villagers in his charge and fixes the amount to be paid by each, which is demanded at harvest-time. The jágirdárs collect their own rents and pay tribute.

Proprietary and Cultivating Classes.—The cultivators are nearly all Bhíls, whose occupancy holdings descend by hereditary right; and the superior proprietary class consists almost entirely of Rájputs and Bhíls.

Land Tenures.—In the event of any *turwi*, or Bhíl headman, being removed from office by the chief, his lands are either allowed

to remain in his possession or granted to his successor. Usually, however, fresh land is assigned to the latter. The Rájput jágírdárs hold their lands on the same terms as their *confrères* in Bánswára.

Rent Rates.—Rates are generally levied by the plough, *i.e.*, as much land as can be ploughed with one pair of bullocks.

The rent for these plots varies from Rs. 7 to Rs. 12 in money, or, if the rent is discharged in kind, a fourth part of the produce is taken.

Population, Castes, Clans, and Tribes.—No estimates can be given of the total number of people within the chiefship. The town of Kusalgarh itself contains about 1,200 inhabitants. The rest of the country is peopled almost exclusively by Bhíls. The only Rájputs in the province are the jágírdárs or Thákurs, a list of whom is given elsewhere.

Occupations.—The pursuits of the people are entirely pastoral and agricultural. There are no manufactures, nor are there any manufacturing classes. In the towns, a small trade in grain, rice, ghee, and other necessary commodities goes on. The crops usually suffice for local wants, and, in years of plenty, grain is exported. With the exception of grain, rice, and ghee, everything is imported.

Judicial System, Jails and Police.—There are no jails; prisoners are confined wherever it may be convenient. The duties of the police are performed by thánadars and the headmen of Bhíl villages, who are responsible for the apprehension of offenders.

Education.—There are no schools whatever.

Communications.—There are no made roads in the district. A highroad from Jhallod in the Panch Mehal to Rutlam passes through the town of Kusalgarh. It is practicable for carts, and the greater part of the goods carried on it goes from Guzerát to Malwa. The customs dues collected by the Ráo on this traffic amounted formerly to Rs. 25,000 per annum, but of late years they have diminished to Rs. 15,000, owing to the diversion of the traffic by a more southern route through Jabúa.

Districts, Towns, and Villages.—Kusalgarh is divided into four districts—

1. Khás Kusalgarh . . .	Centre.	3. Dungra . . .	West.
2. Himatgarh . . .	South.	4. Patan . . .	East.

1. The central district comprises the country around Kusalgarh and contains 124 villages, all inhabited by Bhíls. The town of Kusalgarh is unwallled, and its population consists of traders, Bráhmans, Rájputs, Bohras, and others.

2. The Himatgarh district extends to the south and south-west to the Jhallod and Jabúa frontier, and comprises 32 villages, all Bhíl.

A thánadar and a few sepoys are located here. With the exception of a spirit-seller, a blacksmith, and one Rájpút, all the residents of the village of Himatgarh are Bhíls.

3. The Dungra district lies to the west, and contains 32 villages, all Bhíl. At the village of Dungra there are a thánadar and eight sepoys, and a few smiths, the rest of the population being Bhíls.

4. Patan lies to the east: its chief villages are Patan and Serwa; at both there are thánas. With the exception of 15 houses of Rájpúts at the former and 25 in the latter, the population is entirely Bhíl.

Besides the above, the Ráo of Kusalgarh possesses the districts of Khera in Rutlam and Tanbesra in Bánswára. The former contains 60 villages, all khálsa, and the latter 26 villages.

Fairs.—There is a *méla* held near Tanbesra on the 15th of every month. It is numerously attended by the Bhíls and Rájpúts in the neighbourhood, who come to pay their devotions to Mahadev. No trading takes place.

Weekly markets or *háts* are held at Dungra, Kusalgarh, and Tanbesra, at which grain, vegetables, and cloths are the principal commodities sold.

GAZETTEER OF BHARTPUR.*

Boundaries and Topography.—The State of Bhartpur—bounded on the north by the Punjab district of Gurgaon; on the east by the districts of Muttra and Agra; on the south by the States of Dholpur, Karauli, and Jaipur; on the west by the States of Jaipur and Alwar and the district of Gurgaon—lies between north latitude $27^{\circ} 49' 5''$ and $26^{\circ} 42' 5''$, and east longitude $77^{\circ} 48' 31''$ and $76^{\circ} 54' 53''$. The extreme length from north to south is 76 miles, and its breadth from east to west 63 miles. It contains an area of 1,974 square miles, and a population of 743,710 persons.

Position.

The chief city is Bhartpur, situated centrally in the pargana of the same name, on the high road between Agra and Ajmer, and on the Rájputána State Railway, 35 miles from Agra and 112 from Jaipur. The exact latitude of the fort is $27^{\circ} 13' 14''$ north, and longitude $77^{\circ} 32' 12''$ east. Its height above the level of the sea is 577 feet, and its population 61,448 persons.

Area and population.

Chief city.

The general superficial configuration of the State is flat and rather low, especially towards the north, where it is depressed into a shallow basin. The average height above the sea is about 600 feet, and above the waterway of the Jumna about 50. The uniform character of the country is interrupted by detached hills in the north, by a hilly district in the south, and by low ranges on some parts of the western and south-eastern frontier. The general aspect is an immense alluvial plain, fairly wooded and cultivated, interspersed with villages and occasional towns. In the hot weather the appearance of the country is arid and parched, variegated in places with patches of white saline efflorescence; in the rains, owing to the low level, a considerable amount of surface is flooded, and afterwards the soil is well clothed with vegetation, but it cannot be said to be luxuriant. The scenery is consequently extremely tame and monotonous, with the exception of some picturesque views in the southern mountainous parganas. A

Topography and general aspect.

* Compiled mainly by Dr. S. Brereton, when in charge of the Bhartpur Agency.

great part of the country is not naturally fertile, the soil being hard and dry, and in places much deteriorated with sand. It also suffers from the want of water, but is rendered productive by the industry of the inhabitants in irrigating and cultivating it, so that the traveller from Rájputáná cannot fail being impressed with the prosperous appearance of Bhartpur, where almost every part is cultivated, contrasting strongly with the barren aspect of other parts.

Geology, Hill Ranges, and Minerals.—There is no geological survey of this State: the following description, however, may be considered a short general view of the subject.

The formation of Bhartpur is almost entirely of the sedimentary class. There are no granitic rocks as far as I am aware, and the amount of either metamorphic or volcanic is very small, the igneous rocks occurring only in small amount, and isolated and detached among the aqueous. The exposed rocks may be divided into three classes: (1) alluvial, (2) the series called Vindhyan, and (3) the series called quartzite, in which order they are described.

Bhartpur forms part of the alluvial basin of the Ganges and Jumna, consequently the great majority of the exposed rocks is alluvial, consisting of modern alluvial deposit, with blown sand which the wind carries from the desert of Rájputáná, and occasionally forms into mounds to the leeward of some natural inequality in the surface. It might be said of the greater part of Bhartpur what Sidney Smith said of Holland, "It is the place of eternal punishment of geologists, all mud and no stone," by substituting "clay" for "mud." The soil is of considerable depth, though the humus is shallow, owing to the imperfect system of tillage, and has alternations of thin strata of sand and sandy impermeable clay, and beneath are ancient alluvial deposits with fresh-water shells of the mollusca and occasional kankar (nodular masses of impure calcine carbonate), and clay, shales and laterite.

The Vindhyan occur in the range which runs from Fathpur Sikri towards Hindaun, described under (2) Vindhyan. "Mountains." The range belongs to the Upper Vindhyan division, and two of its sub-divisions—the Bhanver and Riwá—are represented, the former extensively; and probably the third division, the Kaimur, is found in two small hills, which will be mentioned hereafter. The divisions of the Upper Vindhyan given are those of the Geological Survey. This range forms the north-western boundary of this extensive series, which consists of sandstone, shales and limestone, and is remarkable for having no fossils, which, with the fact that no deposits overlie them,

except such as are known to be vastly more recent, has prevented their accurate correlation with any one of the European formations; but it has been satisfactorily ascertained that they are much older than the new red sandstone, with which they were formerly supposed to be coeval, probably belonging to the upper carboniferous. The main range is formed of Upper Bhanvers, consisting almost entirely of sandstone of various texture and colour, varying from a very fine rock to almost conglomerate. The prevailing colour is brick-red, with white spots or streaks, sometimes green and yellowish-white, occurring sometimes in alternate beds of considerable thickness. The stratigraphy of the series, which is usually remarkably uniform and simple, is here more complicated owing to the amount of disturbance which it has undergone. The dip is 25 to 30 at Fathepur Sīkrī, whereas the strata is vertical at Rudāwul, and varies from 5 to 25 in Biāna. The ridge which runs parallel with, and to the west of, the above range in pargana Rudāwul, is probably formed of Riwā : this appears likely both from the character of the stone and the dip of the strata—the general characteristics of the Riwā being coarse greyish-white, while those of the Bhanver are fine red, speckled or streaked with white; in some places these differences are well marked, in others they merge into each other. The ridge consists of sandstone in massive strata and false-bedded flags, usually hard and compact, occasionally vitrified, and reddish or yellowish in colour. In some places, thick shaly beds, mostly quartz or silex, but sometimes clay, are found. Some specimens of the sandstone approach to conglomerate, the pebbles being quartz or red jasper and the matrix purple. Other specimens are more like breccia.

About 13 miles west from Biāna, near the town of Nilhara, are two small hills of a peculiar breccia; though differing lithologically, they probably represent the Kaimur conglomerate. They are interesting, as being the only probable representatives of the Kaimur in Bhartpur: and six miles north of Fathepur Sīkrī is another small hill of the same character, in which the dip of the strata shows that it may possibly lie in the synclinal of the same formation. The extent of the alluvium of Bhartpur underlaid by the Vindhyan formation is doubtful. Along the Gambhīr Valley the Vindhyan must lie against the quartzite series; but how far they extend beneath the alluvium towards the north-west, or whether they are in contact with the quartz in the north and west, has not been determined.

This name is provisionally given to a series of rocks occupying a similar position to the Bijawurs and Gwaliors, but of more recent date. All

the other exposed rocks belong to this series, which is interposed between the Vindhyan and the primitive formation of Jaipur and Ajmer, and is intermediate in age. The hills west of Biána, and divided from the Sidgirpahár by the catchment-basin of the Gambhír river, are formed of quartzite sandstone interstratified with trap and shale.* All the hills in the north and west are of the same character, with limestones, hornstones, graywacke, transition slate, silicious beds, schists, and ferruginous conglomerates; but I have not had the same opportunity of examining them as I had in the southern hills.

The principal hills are a low range forming the boundary between parganas Pahárá and Gopálgarh of Bhartpur, and Fírozpur and Alwar, for about 20 miles, the highest point of which (Chapra) is 1,222 feet high (latitude $27^{\circ} 43'$ and longitude $77^{\circ} 3'$). Its general direction is from north to south.

The Kalápahár, in Akhaigarh pargana, close to the Alwar frontier, contains the highest summit in Bhartpur, Mount Alípúr, 1,351 feet high (latitude $27^{\circ} 8'$, longitude $77^{\circ} 1'$).

The Sidgirpahár range runs on the south-eastern frontier, between the parganas of Rúpás and Biána of Bhartpur, and Sarhendi of Agra. The general direction is from north-east to south-west, and the length about 30 miles; the highest point is Userá, 817 feet (latitude $26^{\circ} 57'$, longitude $77^{\circ} 43'$). In it are situated the celebrated Bánsí Pahárpur stone-quarries. The range becomes broken in the southern part of Biána into irregular branches, which help to form the district called the Dáng—a tract completely broken up with ravines, very difficult of access, and covered with jungle; the highest portions forming a plateau.

North-west and parallel to this is an interrupted range running through Rudáwul to the south of Biána, which, by its southern extremity, helps also to form the Dáng.

The other hills in the south consist of two broken, irregular ranges, running generally in a parallel direction, with several off-shoots through the parganas of Wair and Biána from north-west to south-east. The highest point is Damdamá, 1,215 feet (latitude $26^{\circ} 54'$, longitude $77^{\circ} 17'$). These are separated from the Sidgirpahár range by the Gambhír river. The old fort of Biána is situated on one of them.

In the north there are several groups of detached hills which form an interrupted chain in Kámán, Gopálgarh, and Díg, terminating in Nagar by Mount Rasiá, 1,059 feet high (latitude $27^{\circ} 26'$ and longitude $77^{\circ} 12'$).

Between Kámán and Muttra is another low range, which is continued into Díg. Its general direction is from north-east to

* Copper and iron are also found in small quantities

south-west, and its greatest elevation at Mánpur, 826 feet, in the Muttra district (latitude $27^{\circ} 38'$, longitude $77^{\circ} 27'$).

About three miles distant from Bhartpur is a ridge running from north-east to south-west, about three miles long; the highest point is Madhoní, 714 feet high (latitude $27^{\circ} 13'$, longitude $77^{\circ} 28'$),—a position with sufficient altitude to command the city with modern artillery.

The State is poor in this respect. Copper is found in the hills in Biána and Wair, and these mines were worked in former times, but were given up as they were found not to pay for the working. Iron is also found near Jháj in Biána, but the mines are not worked. No precious stones are found. Brick-clay, kankar, &c., abound, but the quarries only require to be noticed. The stone from the

Building-stone.

south of Bhartpur, known geologically as Upper Bhanver sandstone, has furnished materials for the most celebrated monuments of the Moghal dynasty at Agra, Delhi, and Fathepur SÍkrí; it has also supplied Muttra, Díg, Bhartpur, &c. The quarries of Bánsí Pahárpur, in Rúpbás, are the most celebrated. In Sambat 1922 (A.D. 1865-66), the only statistics available, the amount of stone taken from the quarries was 136,920 maunds, and the duty Rs. 6,846-15-9. The stone is of two varieties—one dark-red, generally speckled with yellowish-white spots; sometimes the white is in streaks or large irregular patches. The other is yellowish-white, homogeneous both in colour and texture, and very fine-grained. These varieties are usually found in separate quarries. The red variety is inferior for architectural purposes to the white, owing to the irregularity of its colouring (this defect is evident in the Taj, where the effect is marred in consequence), also to the liability of some specimens to disintegration from the effects of time, though others retain after three hundred years their carving almost as sharp as when fresh from the chisel: examples of both may be seen in Akbár's palace at Fathepur SÍkrí. The palace of Beerbul's daughter is the best specimen of this stone. The red variety is remarkable for perfect parallel lamination, on account of which, by the introduction of a series of wedges, it readily splits into suitable flags, which are much used for roofs and floors; but this quality diminishes its value in other respects.

Experiments were made by Lieutenant Boileau, R.E., with singular results. He found that the strength of the red stone to the white, both being dry, was as 11 to 17; whereas the strength of the former to the latter in the wet state was as 11 to 9—that is, the white lost nearly half its strength by saturation, whereas the red remained nearly the same, which would prove it peculiarly adapted

for roofing. The mean breaking weight of slabs $4\frac{1}{2}' \times 12" \times 1\frac{1}{2}'$, supports 4 feet apart, was—

Dry	{	Red	.	.	.	.	392 lbs.
		White	.	.	.	.	575 "
Wet	{	Red	.	.	.	.	386 "
		White	.	.	.	.	300 "

I am not aware that these experiments have been repeated.

The yellowish-white variety is remarkable for its fineness and uniformity of texture, allowing delicate and elaborate work, while, owing to the thickness of many of the beds in which it is found, it can be procured of great size: it is also uniform in its colour. The palaces at Díg, which are considered some of the most beautiful in India, testify to the excellence of this stone. The palace, the temple, and other structures in Bhartpur are also built of it, and the cenotaphs of the Bhartpur Máharájás at Gobardhan. There are two monoliths near Rúpbás, which show the immense blocks these quarries yield; they are of the red variety. One is a column $34' 6"$ long, with an average diameter of $2' 11"$, the other parallelopiped $42' 6" \times 5' 6" \times 4'$ on an average. About two miles east of Rúpbás, in the temple of Balda, there are three prostrate idols, respectively $28'$, $22'$, and $21'$ long; one has a breadth of nearly $8'$, and all are monoliths. They are said to have been dug up near at hand, about seventy years ago, by a former chief of Bhartpur.

Climate and Rainfall.—The only observations taken are the temperature of the air, and rainfall, neither of which are rigorously accurate, as the instruments are imperfect, and the system of registration lax. The annexed table (page 138), showing the temperature and rainfall, may be considered as giving only a fairly approximate idea.

The mean temperature of the month is calculated from the mean of the shade maximum and minimum of the same day, which only gives it approximately. In temperate climates in the summer, the mean monthly error would be $+ 1.9^\circ$ Fahr., and in the tropics the mean of the maximum and minimum is still farther from the truth; but in this instance, this error is more than counterbalanced by others in the instruments, so that the actual average height of the temperature is probably not exaggerated.

The coldest month is January, its average temperature being 63.46° ; February is only 4° hotter; the temperature then rises at the rate of 10° a month in March and April, and at the rate of 4° or 5° a month in May and June, when it attains its maximum, the average being 95.31° . There is then a fall of 8° with the rains in July, and a still further fall of 3° or 4° in August. A slight rise

of 1° takes place in September, and a fall of 4° in October. During November and December the temperature falls at the rate of 9° or 10° a month, till it attains its minimum in January.

The amplitude of the diurnal fluctuations is greatest in April, the mean of four years is 10.38° ; and least in July, 4.04° . The yearly average is 8.07° ; the mean amplitude of annual fluctuation in the same period is 31.85° ; 63.46° in January, and 95.31° in June.

Enormous undulations are occasionally caused by the hot winds from Rájputáná, but their extent has not been hitherto observed.

As will be observed from the table, the mean temperature of Bhartpur is high, 80.56° , especially in the hot months, the mean of June for four years being 95.31° . Sometimes, for example in 1876, the mean of the month rises to 98° . This temperature can be accounted for by several reasons,—the geographical position of Bhartpur, the trifling amount of water, its low elevation above sea-level and the surrounding country, the bareness of the soil owing to the comparative absence of herbage, the exposure to the hot winds from the desert, and the nature of the soil, being usually hard, dry clay mixed with sand.

The amount of vapour in the air varies considerably both with season and locality—in the hot weather the amount is very small, whereas after the rains, especially in the districts which are subject to an annual inundation, the humidity approaches a saturation.

The depth of the sub-surface water varies from $13\frac{1}{2}$ to 48 feet. The average of the wells in each of the parganas is as follows:—

Bhartpur	.	.	.	.	.	.	33 $\frac{1}{2}$ feet.
Akhaigarh	.	.	.	.	.	.	27 "
Pahárá	.	.	.	.	.	.	16 $\frac{1}{2}$ "
Kámán	.	.	.	.	.	.	48 "
Díg	.	.	.	.	.	.	31 $\frac{1}{2}$ "
Wair	.	.	.	.	.	.	48 "
Rudáwul and Uchain	.	.	.	.	.	.	13 $\frac{1}{2}$ "
Average							31 feet.

The water in most of the wells is brackish.

Statement showing the Mean Temperature, Mean Daily Range, and Rainfall of each month at Bhartpur, with totals and averages for four years ending 31st May 1876.

Months.	1872.			1873.			1874.			1875.			1876.			AVERAGE OF 4 YEARS.		
	Mean tem- perature.	Mean daily range.	Rainfall.	Mean tem- perature.	Mean daily range.	Rainfall.	Mean tem- perature.	Mean daily range.	Rainfall.	Mean tem- perature.	Mean daily range.	Rainfall.	Mean tem- perature.	Mean daily range.	Rainfall.	Mean tem- perature.	Mean daily range.	Rainfall.
January	65.99	12.15	0	59.45	9.10	0.5	63.11	9.38	35	65.29	8.78	...	63.4	9.22	23
February	69.64	12.81	...	64.66	9.96	0.3	69.54	7.49	1.54	69.87	9.09	...	67.68	9.08	39
March	78.32	11.16	...	74.83	7.29	1.5	83.55	9.49	...	78.93	8.45	1.9	78.90	9.09	15
April	90.11	10.70	...	86.23	10.16	...	88.69	9.73	...	85.56	10.34	1.0	87.66	10.38	02
May	91.69	9.71	1.74	92.08	7.78	1.01	92.53	8.74	35	94.69	8.32	7.0	92.81	8.63	85
June	...	6.50	1.0	97.40	7.60	1.14	92.80	6.60	3.70	97.38	6.70	22	...	...	...	95.31	6.92	1.36
July	...	4.04	4.56	89.25	3.93	18.03	87.06	4.13	7.35	90.09	4.07	4.37	...	...	...	88.81	4.04	8.80
August	...	4.94	9.56	80.82	5.29	15.23	84.07	4.61	10.88	86.07	4.49	5.84	...	...	...	85.75	4.82	11.80
September	...	7.17	2.40	87.09	6.83	7.69	85.99	4.90	3.27	85.04	4.43	10.52	...	...	...	86.35	6.13	5.98
October	...	9.84	...	83.65	5.15	...	84.06	13.62	1.0	79.08	8.30	...	...	...	...	82.45	9.21	02
November	...	0.65	...	71.22	10.10	...	72.76	10.40	...	71.69	9.67	...	...	...	...	72.82	9.11	...
December	...	8.35	...	63.62	8.29	1.0	63.44	0.78	...	67.82	7.94	7.7	...	...	...	64.75	8.28	31
Yearly Average	65.27	6.52	16.94	81.49	9.83	44.98	79.19	6.10	32.44	81.10	7.63	23.96	78.72	9.23	...	80.56	8.07	20.89

No information with regard to the barometric pressure can be given, as previous to the present year there are no observations. The monsoon rains generally begin at the end of June or commencement of July, and cease in September: the number of days on which rain falls sufficient to be registered is comparatively few.* The maximum number of inches in one day during four years is 5·4 inches. There is usually some rain—called *mahawat*, from the month it usually comes in—less than 5 inches, in the end of December or the beginning of January, which is of great benefit to the rabi; and in May nearly 1 inch, called *jeth-ka-dongra*. According to the table, the average rainfall is 29·89 inches, but this average is said to be vitiated by the abnormally heavy fall in 1873. The average rainfall has been estimated at 22 inches, but without observations to support the assertion, though it has been ascertained that the fall differs in different parts of the territory.

The prevalent winds in the cold seasons are the east and north; in the hot, the west and south; and in the rains, the east and north. Most of the rain is said to come from the north-east; and as this observation has been made in the other neighbouring parts of Rájputáná, it is not probably due to any local cause, but to the fact that the rain which falls in Bhartpur comes up the Ganges Valley from the Bay of Bengal, and that nothing of the monsoon from the Arabian Sea comes so far. Occasionally, as in the present year, the rain comes from the west, when there is great difference of temperature between the part of India adjacent to the Arabian Sea and the upper part of Rájputáná. It is to be regretted that no observations with the dry and wet bulb, the barometer or anemometer, have been made, or any systematic record of the weather kept, as any account of the weather without these is of little value. The popular belief in Bhartpur is that the climate is bad, with the exception of the parganas of Biána, Bhusáwar, and Akhaigarh; which belief is confirmed by experience; and it would also theoretically be deduced from the description given of the topography, geology, and meteorology of the district that the climate was unhealthy. Most of the diseases attributed to the climate, especially the large class to which the name of “malarious” is applied, are common among the inhabitants; and people from other localities are affected, first, with loss of appetite, lassitude, and depression, followed often by general debility. The most exhausting effects are felt when the great heat is continuous both night and day, especially as the air is highly rarified and the amount of oxygen consequently lessened, and respiration also is impaired.

* Average number of rainy days per annum, 40.

Climate may be defined as the sum of the influences of the sun on the water and soil of a place affecting health, and certain conditions of each of those factors are such in Bhartpur as to affect it unfavourably. The chief of these conditions are the following:—The mean temperature is shown to be very high, especially taking into consideration the considerable annual fluctuation, and its being subject to undulations. The air, with regard to humidity, has a tendency to extremes, and is impure from malaria. The quality of the water is generally very inferior, containing much saline impurities, principally sodium salts, also those of calcium, magnesium, with occasional iron and silica, and often much organic matter: the solids in a gallon vary from 20 to 120 grains. The conformation and elevation of the soil are unfavourable, it being flat and low, while, owing to its mechanical structure, the absorption of heat is great and the radiation slow, especially as there is little herbage; and its chemical composition affects the water and produces malaria. A considerable area of Bhartpur exactly represents one type of a malarious country—a low-lying, alluvial soil, with strata of sandy impermeable clay, or sand with an impermeable clay sub-soil, organic impurities, a high temperature, and an annual inundation when the water neither drains off nor is absorbed. Much improvement is possible by drainage and attending to hygiene, the latter being even more needed where putrescence is so favoured by the high temperature and humidity in and after the rainy season, when a great percentage of the population suffers from fevers, which are followed by their usual train of effects in other seasons.

Rivers.—The State is poorly supplied with rivers, none of them being navigable or even perennial. The principal are the Bángangá or Utangan, the Rúpárel, the Gambhír, and the Kákand.

The Bángangá rises in Jaipur, and flows through Bhartpur from west to east. Its point of exit is near the village of Morolí in Rúpbás, where it helps to form the boundary between Bhartpur and Agra. It receives no tributary of importance, except the Gambhír, which joins it from the southern bank near Kurká, in Rúpbás pargana. It enters Bhartpur near Kumálpur, in Bhusáwar. The banks are low, in consequence of which it does considerable damage occasionally by overflowing and carrying sand over the land. The bed is shallow and sandy, and of considerable width in some places. It forms several islands in the rains, and leaves a large sandy track in the dry weather. This river formerly flowed through a gap in the range of hills which runs down through Rúpbás, but now turns their left flank.

The Rúpárel rises in Alwar and enters Bhartpur territory near the village of Síkrí, in Gopálgarh Rúpárel. pargana. Shortly after entering, it is held up by the Síkrí bund, by which the water is distributed in two directions : one goes north-east, towards Gopálgarh, Pahári, Kandlá, and Kámán ; and the other south-east, towards Díg, Kumbhír, and Bhartpur. The north-east division terminates in the Kámán Valley, from which there is no exit ; so that in years of heavy floods the country is inundated from Pahári to Kámán, and even extends occasionally into the Muttra district. The south-east division passes through the Kho Dher near Díg, and after that through a succession of other *jhíls* into the Motí Jhíl bund at Bhartpur, and finally into the Orin Nadí, which is a tributary of the Khárá, and the Khárá finally runs into the Bángangá, in the Agra district.

The Gambhír rises in Jaipur and reaches Bhartpur territory on the south-west extremity of Biána Gambhír. pargana, where for some distance it forms the boundary between Bhartpur and Jaipur ; it then turns and flows in a general north-west direction through Biána pargana, and joins the Bángangá in Uchain, having received the Kákand on its right bank, about eight miles from its junction with the Bángangá. The valley of the Gambhír is highly cultivated. It separates the Biána hills, which are of different formations on each side, as described under " Geology."

The Kákand rises in Karauli and enters Bhartpur on the southern border of Biána. At first its Kákand. course is over a rocky plateau, from which it descends by a series of falls near the village of Gádha ; it then runs through a basin surrounded with hills, the drainage of which it collects, and from which it emerges near Báraithá, and, flowing in a northerly direction, joins the Gambhír. Both these rivers are subject to sudden rises, but are generally fordable.

*History.**—The founder of the present ruling house in Bhartpur was a Ját landholder, by name Chúra-man, who built two petty forts in the villages of Thún and Sinsiniwár,† a little south of Díg, from which he organized marauding expeditions, and even ventured to harass the rear of the imperial army on the occasion of Aurangzeb's expedition into the Dekhan. According to the *Siyar-ul-Mutákhirín*, during the struggle between Aurangzeb's sons, Azam and Muazzam, Chúra-man beset the camp of the latter for the purpose of plunder.

* Much of the historical sketch which follows has been taken from a memoir on the Muttra District, by Mr. F. Growse, C.S.

† From this place the Bhartpur Rájá's family derives its name of Sinsinwár.

A little later, Jai Singh of Āmber was commissioned by the two Sayyids, then in power at Delhi, to reduce the Ját freebooters. He invested their two strongholds, but could not succeed in making any impression upon them, and accordingly retired; only, however, to return almost immediately, this time bringing with him a larger army, and also a local informant in the person of Badan Singh, a younger brother of Chúra-man, who, in consequence of some family feud, had been placed in confinement, from which he had contrived to escape and make his way to Jaipur. Thún was then (1712 A.D.) again invested, and, after a siege of six months, taken, and its fortifications demolished. Chúra-man and his son, Muhkam, fled the country, and Badan Singh was formally proclaimed at Díg as leader of the Játs, with the title of Thákur.

For some years before his death, Thákur Badan Singh had retired altogether from public life. To one of his younger sons, by name Pratáp Singh,* he had specially assigned the newly erected fort at Wair, south-west of Bhartpur, with the adjoining district; while the remainder of the Ját principality was administered by his eldest son, Súraj Mal. On his father's death, Súraj Mal assumed the title of Rájá, and fixed his capital at Bhartpur, from which place he had ejected the previous governor, a kinsman by name Khema, whom he killed in a night attack on the small mud fort which then existed. Súraj Mal then built another much larger fort. Even at the commencement of his rule he had achieved a conspicuous position, since, in 1748, we find him accepting the invitation of the Emperor Ahmad Sháh to join with Holkar, under the general command of the Vazír Safdar Jang, in suppressing the revolt of the Rohillas. In the subsequent dispute that arose between Safdar Jang and Gházi-ud-dín, the grandson of the old Nizám, the former broke out into open rebellion and called in the assistance of the Játs, while his rival had recourse to the Marathas. Safdar, seeing the coalition against him too strong, withdrew to his viceroyalty of Oudh, leaving Súraj Mal to bear alone the brunt of the battle. Bhartpur was besieged, but had not been invested many days when Gházi-ud-dín, suspecting a secret understanding between his nominal allies, the Marathas, and the emperor, discontinued his operations against the Játs, and returned hastily to Delhi, where he deposed Ahmad Sháh, and raised Alamgír II to the throne in his stead. This was in 1754. Three years later, when the army of Ahmad Sháh Duráni, from Kandahar, appeared before Delhi, Gházi-ud-dín, by whose indiscretion the invasion had been provoked, was admitted to pardon in consideration of the heavy tribute which he undertook to collect from the Doab. Sardar Jahán Khan was despatched on a

*Two other sons were named Sobhá Rám and Bír Náráyan.

like errand into the Ját territory; but finding little to be gained there, as the entire populace had withdrawn into their numerous petty fortresses, and his foraging parties were cut off by their sudden sallies, he fell back upon the city of Muttra, which he not only plundered of all its wealth, but further visited with a wholesale massacre of the inhabitants. In the second invasion of the Duráni, consequent upon the assassination of the Emperor Alamgír II in 1759, the infamous Gházi-ud-dín again re-appeared at the gates of Bhartpur; this time, not with a hostile army, but as a suppliant for protection. In the winter of 1759-60 Ahmad Sháh came sweeping down a second time through the north-western passes into the Punjab, and drove the Maratha officers out of that province without a struggle, defeated the armies of Holkar and Sindia, and cleared the Marathas out of the country round Delhi down to the neighbourhood of Agra. To repair these misfortunes, the Peshwa sent a large army up from the Dekhan, which was joined by a strong contingent from Bhartpur under Súraj Mal; but the Ját chief firmly opposed the Maratha plan of fighting a pitched battle against Ahmad Sháh, advising a loose skirmishing warfare, and the cutting-off of supplies. The Maratha commander, however, gave Súraj Mal to understand that petty chiefs of his calibre knew nothing about war on a grand scale, so the Ját chief, foreseeing the result of such strategy, departed one night with great speed and secresy, withdrawing his whole force of some 30,000 men. After the defeat of the Marathas he fell unexpectedly on Agra, turned out the Maratha governor, and made it his own residence. Meanwhile Shah Álam was recognized by the Duráni as the rightful heir to the throne, but continued to hold his poor semblance of a court at Allahabad; and at Delhi his son Mírza Jawán Bakht was placed in nominal charge of the government under the active protectorate of the Rohilla, Najíb-ud-daula. With this administrator of imperial power, Súraj Mal, emboldened by past success, now essayed to try his strength. He put forth a claim to the faujdárship of Farakhnagar; and when the envoy, sent from Delhi to confer with him on the subject, demurred to the transfer, he dismissed him most uncere- moniously, and at once advanced with an army to Sháhdara on the Hindaun, only six miles from the capital. Here, in bravado, he was amusing himself in the chase, accompanied by only his personal retinue, when he was surprised by a flying squadron of the enemy and slain. His army, coming leisurely up behind under the command of his son Jawáhir Singh, was charged by the Moghals, bearing the head of Súraj Mal on a horseman's lance as their standard—the first indication to the son of his father's death. The shock was too much for the Ját, who were put to flight, but

still continued for three months hovering about Delhi in concert with Holkar. This was in 1764.

In spite of this temporary discomfiture, the Jāts were now at the zenith of their power: and Jawāhir had not been a year on the throne when he resolved to provoke a quarrel with the Rājā of Jaipur. Accordingly, without any previous intimation, he marched his troops through Jaipur territory with the ostensible design of visiting the holy lake of Pushkara. There his vanity was gratified by the sovereign of Marwar, Rājā Bijay Singh, who met him on terms of brotherly equality: but he received warning from Jaipur that if he passed through Amber territory on his return, it would be considered a hostile aggression. As this was no more than he expected, he paid no regard to the caution. A desperate conflict ensued (1765) on his homeward route, which resulted in the victory of the Kachhwahas, but a victory accompanied with the death of almost every chieftain of note. Soon after, Jawāhir Singh was murdered at Agra, at the instigation, as is supposed, of the Jaipur Rājā.

Sūraj Mal had left four sons, *cit.*, Jawāhir Singh, Rām Singh, Naval Singh, and Ranjit Singh; and also an adopted son, Hardeva Bakhsh, whom he is said to have picked up in the woods one day when hunting. On the death of Jawāhir, Rām succeeded: but his rule was of very short duration. A pretended alchemist from Brindāban had obtained large sums of money from the credulous prince to prepare a process for the transmutation of the meaner metals into gold. When the day for the crucial experiment arrived and detection had become inevitable, he assassinated his victim and fled.

His brother Naval Singh succeeded, nominally as guardian for his infant nephew Kesari, but virtually as Rājā. The Marwarhs had now (1768) recovered from the disastrous battle of Paripat, and re-asserting their old claim to tribute, invaded first Jaipur, and then Bharatpur, and mulcted both territories in a very considerable sum. They then entered into an understanding with the Delhi Government, which resulted in the restoration of Shah Alam to his ancestral capital. But as the only line of policy which they consistently maintained was the fomentation of perpetual quarrels, by which the strength of all parties in the State might be exhausted, they never remained long faithful to one side or the other. In the year 1772 we find them fighting with the Jāts against the imperialists. Naval Singh, on, according to some accounts, his brother and successor, Ranjit Singh, fell off the top of the fort of Ballabhpur, held by another Jat chieftain. The latter applied to Delhi for help, and a force was despatched for his relief; but it was too weak to resist the combined attacks of Shah Alam

Bhartpur, and was driven back in disorder. The Marathas then pushed on to Delhi, but finding the commander-in-chief, Niyáz Khán, ready to receive them, they, with incomparable versatility, at once made terms with him, and even joined him in an expedition to Rohilkhand. Meanwhile, the Játs, thus lightly deserted, espoused the cause of Najaf's unsuccessful rival, Zábíta Khán. But this was a most ill-judged move on their part : not only were their troops repulsed before Delhi, but their garrison was also ejected from Agra,* which they had held for the last thirteen years since its occupation by Súraj Mal after the battle of Pánipat in 1761. From Agra the Vazír Najaf Khán hastily returned in the direction of the capital, and found Ranjít Singh and the Játs encamped near Hodal. Dislodged from this position, they fell back upon Kotbah and Kosi, which they occupied for nearly a fortnight, and then finally withdrew towards Díg ; but at Barsána were overtaken by the Vazír and a pitched battle ensued. The Ját infantry, 5,000 strong, were commanded by Sumroo, or, to give him his proper name, Walter Reinhard, an adventurer who had first taken service under Ranjít's father, Súraj Mal. The ranks of the imperialists were broken by his gallant attack, and the Játs, feeling assured of victory, were following in reckless disorder, when the enemy rallied from their sudden panic, turned upon their pursuers, who were too scattered to offer any solid resistance, and effectually routed them. They contrived, however, to secure a retreat to Díg, while the town of Barsána, which was then a very wealthy place, was given over to plunder, and several of the stately mansions recently erected almost destroyed in the search for hidden treasure. Díg was not reduced till March of the following year (1776), the garrison escaping to the neighbouring castle of Kumbhír. The whole of the country also was reduced to subjection, and it was only at the intercession of the Ráni Kishori, the widow of Súraj Mal, that the conqueror allowed Ranjít Singh to retain the fort of Bhartpur with an extent of territory yielding an annual income of nine lakhs. After the death of Najaf Khán in 1782, Sindia seized all Ranjít Singh's territories, including Bhartpur ; but again the widow interceded in her son's behalf, and Sindia restored eleven districts, yielding ten lakhs, to which three more, yielding four lakhs, were subsequently added for services rendered to General Perron.

When the Marathas under Sindia failed in their attempts to lay Jaipur under heavy contribution, and had got into difficulties at Lalsot, they fell back upon the Játs, and secured the alliance of Ranjít Singh by the restoration of Díg, which had been held by the emperor since its capture by Najaf Khán in 1776, and the

* The commander of the Ját garrison in Agra was Dan Sahay, brother-in-law of Naval Singh.

cession of eleven parganas, yielding a revenue of ten lakhs of rupees. The main object of the new allies was to raise the siege of Agra, which was then being invested by Ismail Beg, the imperial captain, in concert with Zábíta Khán's son, the infamous Ghulám Kádir. In a battle that took place near Fathepur Síkrí, the Játs and Marathas met a repulse, and were driven back upon Bhartpur; but later in the same year, 1788, being reinforced by troops from the Dekhan under Rana Khán, a brother of the officer in command of the besieged garrison, they finally raised the blockade, and the province of Agra again acknowledged Sindia as its master.

On the termination of the Maratha war in 1803, the British Government concluded a treaty with Ranjít Singh, who, with 5,000 horse, had joined General Lake at Agra, and thereby contributed to Sindia's defeat. In return for this service he received a grant of the districts of Kishangarh, Kattáwa, Rewari, Gokul, and Sahár. Nevertheless, the Rájá of Bhartpur, while in alliance by treaty with the English Government, entered into secret correspondence with Jeswant Ráo Holkar, who was then at war with the English, and afforded him every kind of encouragement and support. At the battle of Díg in November 1804, the Bhartpur troops, which the Rájá declared to have been assembled for co-operation with the British, were actually engaged against them, and the fort opened a damaging fire upon the British army. After the battle of Díg, Holkar took refuge in the Bhartpur fort, and all the resources of the State were openly employed on his side of the war. The Bhartpur fort was thereupon besieged. Ranjít made a memorable defence, and repelled four assaults with a loss to the besiegers of 3,000 men, but finally made overtures for peace, which were accepted on the 4th of May 1805. A new treaty was concluded, by which he agreed to pay an indemnity of twenty lakhs of rupees, seven of which were subsequently remitted, and was guaranteed in the territories which he held previously to the accession of the British Government. The parganas granted to him in 1803 were resumed.

Ranjít died that same year, leaving four sons—Randhír, Báaladeva, Harideva, and Lachhman. He was succeeded by the eldest, Randhír, who died in 1823, leaving the throne to his brother, Báaladeva.* After a reign of about eighteen months he died, leaving a son, Balavant, then six years of age. He was recognized by the British Government, but his cousin, Durjan Sál, who had also advanced claims to the succession on Randhír's death, rose up against him, and had him cast into prison. Sir David Ochterlony, the Resident at Delhi, promptly moved out a force in support of the rightful heir, but their march was stopped by a peremptory

* Randhír Singh and Báaladeva Singh are commemorated by two large temples on the margin of the Manasí Ganga at Góladhian.

order from Lord Amherst, who, in accordance with the first policy of non-interference which was then in vogue, considered that the recognition of the heir-apparent during the life of his father did not impose on the Government any obligation to maintain him by arms. Nevertheless, when the disputed succession threatened a protracted war, the Governor-General reluctantly confirmed the representations of Sir Charles Metcalfe, and consented to the deposition of the usurper. After a siege that extended over nearly six weeks, Bhartpur was stormed by Lord Combermere on the 18th of January 1826. Durjan Sál was taken prisoner to Allahabad, and the young Mahárájá established on the throne under the regency of his mother, and the superintendence of a Political Agent. He died in 1853, and was succeeded by his only son, Jeswant Singh, the present sovereign, who enjoys a revenue of about Rs. 21,00,000, derived from a territory of 1,974 square miles in extent, with a population of 650,000 souls.

Form of Government.—The form of government is that usually found in Native States—a kind of a modified absolute monarchy limited only by public opinion, lay and religious; by custom; and by the power of interference held in reserve by the paramount Empire. The *gadi* is hereditary in the family of the present Mahárájá, who has received a sanad of adoption. His State is in offensive and defensive alliance with the Imperial Government. He is entitled to a salute of 17 guns.

Beshinder Sawai Jeswant Singh Bahádur, Bahádur Jang, Mahárájá of Bhartpur, son of Mahárájá Balwant Singh, is twenty-four years of age, having been born in 1852. His father died leaving him a minor at the age of two, and, until his assumption of full powers on becoming of age in 1869, the State was managed by a Council of Regency and the Political Agent.

His Highness married the daughter of the Mahárájá of Patialá, who died in 1870. There are two children living—one, the heir-apparent (or *Kumarji*, from the Sanskrit *kumar*, “a son”) named Ram Singh, is over four years old; the other, a daughter, three months old. The pargana of Bhartpur called Deorhi is set apart for the zenana: the income is over two lakhs.

The following festivals are observed by the State:—Dasera Asouj, Basant Panchami Magh, Holi Dúj Chait Badi, and Tij Sanwan Sudi. The Dasera and Dúj darbárs are held in the *Phulbari*, that of Basant Panchami at the *Jawáhir Burj*, and of Tij in the *Kacheri*. Some of the Sirdars receive dresses of honour on the occasion of these festivals. On Dasera the chief goes to the *akhad* in procession, and reviews the troops; at Basant all wear yellow costumes dotted with red; and at the Tij, scarlet.

There are establishments for the kitchen, illuminating; and

camp; but they require no notice. A small menagerie is kept with a few animals. The *toshakhana* is particularly rich in jewels, weapons, cloths and shawls, and trappings. Formerly there were three studs—at Bhartpur, Kumbhír, and Biána; the brood-mares were kept at Kumbhír, the colts and fillies at Biána, the climate of which is suited for their growth, and, when fit to train, they were sent to Sewar. Now the brood-mares also are kept at Biána, where new buildings have been erected. The stables at Sewar contain a large number of horses, mostly country-breds. The Mahárájá has got a good private library of the standard British works; there is also a small one in the palace, including an old and valuable copy of the *Ain-i-Akbári*; and some important Sanskrit manuscripts are said to be in the *toshakhana*. Six *ghannas* or preserves are kept up—four at Bhartpur, one at Díg, and one at Rúpbás—with a number of rangers; the game found consists of black buck, pig, hares, and nilgai, which are numerous, but are forbidden to be shot on religious principles. No large wild animals are found, except numbers of cattle, which, from religious motives, have been turned loose, and are now wild. The small game found consists of ducks in great numbers and variety, black partridges, snipe, and quail.

Aristocracy and Official Classes.—No distinction can be made between the aristocracy and official classes in Bhartpur. As shown under the heading “Land Revenue,” the amount of *jágír* is comparatively very small. An approach to a feudal system, which is common in the other States of Rájputáná, does not obtain in Bhartpur. The *jágírdárs* who exist have no legal jurisdiction in their estates, and pay no tribute or service for them. The officials constitute the aristocracy, and if they lose their appointments or die, they, or their families if the son does not succeed, sink into oblivion and mediocrity, as they generally have no estates on which to support their position. Many families of former officials are in this state now. Appointments, as a rule, are not hereditary: the son does not succeed the father, unless he is suitable, or obtains favour with the chief through interest or otherwise.

In the Bhartpur State there is no aristocracy of birth and lineage corresponding with the dominant clan families of a Rájput State. The relations of the Mahárájá are called *Thákurs*; but, apart from this kinship, they are not considerable either by wealth or independent rank. The most important among them is *Thákur Gangábaksh Námwalá*, grand-uncle to the Mahárájá, and being next to his cousin Rao Ajit Singh, his nearest relation, is treated with the utmost respect. His *jágír* is worth Rs. 5,618-12; the remainder, about sixteen or seventeen in number, have 27½ villages, with an aggregate income of Rs. 41,223.

All the Sirdars entitled to *utr* and *pán* at darbárs, with the exception of Faujdár Daulat Singh and a few others, hold official appointments. Faujdár Daulat Singh represents one of the oldest families, and is the first Sirdar in Bhartpur. He has the *jágír* of Ballabgharh, which was conferred by Jaipur when Bhartpur formed part of the State: it is by far the largest in the State, having an area of 22·93 square miles, or 36,688 *bíghas*, which, at the average of Re. 1-3 per *bígha*, has a revenue of Rs. 43,554-6 per annum. The remainder of all the *jágírs* have a total revenue of only Rs. 86,299-2.

Agriculture, Land Revenue and Tenures, Proprietary and Cultivating Classes.—With the exception of some trifling cultivation on the plateau of the Dáng, spoken of under “Mountains,” and in some of the other hills, all the cultivated land of Bhartpur is low, and, provided it is not covered with water, the very lowest yields the best and most valuable crops. The soil of this State varies from heavy clayey to light sandy: the former is the most usual, and generally of great depth. The sand is found only on the surface, or disposed in thin strata alternating with clay. Until saturated by the rains, the soil is hard, dry and cohesive, the clay (silicate of alumina) being associated with stiff marl (lime and clay).

Soils are locally divided, with reference to irrigation, into *cháhi* and *baráni* (irrigated and unirrigated); with regard to quality, into *chiknot*, *bhúr*, and *debr* (rich, poor, and moist): the latter is low land, on which water lies for a great part of the year: and with reference to the crops it produces, into *kharíf* and *rabi*. Mewat, Bhartpur, Uchain and Rudáwal have the best land, while Díg has the poorest. For average rent see “Land Tenures.”

The exact amount of each kind of soil it is impossible to determine, but the *chiknot* and *debr* are of much less area than the others. Agriculture is in a backward state, but probably not worse than in the neighbouring parts. No means are taken to improve either the land or crops, except by desultory irrigation; no manure is used as a rule; the implements are very primitive and indifferent. The tillage only scratches the surface of the ground, so that the humus is very shallow. Rotation of crops is not understood, and the seed is not improved by importation or change. The sheep and cattle are both small and badly bred; the good bullocks met with are imported, the district not being naturally adapted as a cattle-producing country.

The implements and tools in use are—the *hal* or plough, of the usual national pattern; the *mej*, used like a harrow for levelling the ground and breaking clods; the *phaora*, a sort of broad hoe,

which is used instead of both spade and shovel. There are also rude wooden attempts at forks called *jeria*. Transporting the produce is done either by manual labour or by a class of Musalmán porters called *palledars* or *hammáls*, or by carts called *chakra* or *tanga*, which are of a fair size, rather substantial and suitable, and drawn by bullocks.

Only one crop, either the rabi or kharíf, is taken off the land in the year: after the crop is raised the land lies fallow till the next year. The only exception are small patches of rich land (*gonda*) in the vicinity of villages and wells, which, owing to irrigation and manure, yield an intermediate crop of vegetables. The principal crops grown are—

- (1) *Cereals*—wheat, barley, rice, bajra, jowár, Indian-corn.
- (2) *Pulses*—gram, arhar, múng, urid, moth, chownla, masur.
- (3) *Fibres*—cotton, flax.
- (4) *Miscellaneous*—sugarcane, poppy, tobacco, tíl, kangni, sarsoo.

The light and inferior soils, as a rule, yield the kharíf crop, which is sown in June or July with the first fall of rain, and consists of the following: bajra, jowár, tíl, múng, urid, moth, makai, arhar, chownla, kangni, sawan, gowar and mandúa, rice, cotton, and sugarcane: the three latter requiring good soil. Rice is not sown to any extent, and sawan springs up naturally; jowár, bajra, and urid are the principal kharíf crops, and on these the lower classes depend for their sustenance. The ground is ploughed up with the *hal*, and the ploughman scatters the seed as he proceeds. No manure is used. When the plant is a foot high, it is weeded—once for jowár, twice for the other crops. About the end of September the corn is ripe, and, when dry, is reaped, and stacked on the threshing-floor or *khalian*, where it is threshed out by oxen treading it, or, when the quantity is small, the *kison* threshes it with a stick. Sugarcane is cultivated to a considerable extent, especially in the Rúpbás pargana, and molasses manufactured. Cotton is sown principally in Biána, Akhaigarh, and Bhusáwar. Parts which enjoy comparative security from inundation are those generally favourable to the growth of the plant. It is sown in a rich, hard, clayey soil in the months of April and June; the first sowings are watered by wells and yield a spare crop; the latter depend on rain. The pickings take place in October, and are over by the end of the year.

The gross produce of the State may be estimated at 150,000 maunds of raw cotton, or 50,000 bales, a bale being equal to three maunds. Of this, one-third is probably the valued commercial staple. Calculating at 5 maunds per bigha, 30,000 bighas would represent the area under cotton cultivation. Of the total pro-

duce, a small percentage is consumed by the inhabitants, therest being taken eastwards. The State charges a duty of 4 annas per maund on its transit and export, and in favourable years realizes a revenue of Rs. 30,000 or more. The present market value of cotton is Rs. 12-4 per maund: including customs 4 annas, cartage 2 annas, other expenses 2 annas, the net value of one maund at Agra would be Rs. 12-12.

Poppy is grown in Biána and Bhusáwar only. Kámán and Rúpbás receive their supply from Mowah, Rámgarh, Dholpur, and Gwalior. The State duty on import is Rs. 4 a maund.

The best soil yields the rabi crop, which is sown in October and November, and consists of wheat, barley, gram, sarson, masur, and alsí. The fields are ploughed up five or six times, and each time levelled with the *mej*. The crop requires no weeding.

The cost of production varies in rabi and kharíf, also with the description of grain sown. Taking jowár as the type of kharíf, the average cost of production and profit per bigha would be as follows:—

	Rs.	A.					Rs.	A.
Taking 4 maunds as produce per bigha : 4 maunds at the rate of 30 seers for the rupee would be	5	5	Rent	...	...	...	1	4
<i>Niar</i> , or fodder	7	0	Ploughing	...	...	...	0	8
			Seed	...	...	...	0	4
Total	12	5	Weeding	...	...	...	0	12
Deduct cost of production	3	5	Reaping	...	...	...	0	5
			Threshing	...	...	...	0	4
Net profit	9	0	Total cost	...	...	...	3	5

Four maunds is a fair yield per bigha. The *Niar* consists of the straw, chaff, broken grain, &c.

Taking wheat as the type of rabi, the cost and profit are as under:—

	Rs.	A.					Rs.	A.
8 maunds produce, at 30 seers per rupee	10	10	Rent	...	...	...	3	0
<i>Niar</i>	10	0	Ploughing	...	...	...	2	0
Total	20	10	Seed	...	...	...	0	12
Deduct cost of production	6	10	Reaping	...	...	...	0	8
			Threshing	...	...	...	0	6
Net profit	14	0	Total cost	...	...	...	6	10

The holdings are generally small—four or five bighas—but frequently wealthy individuals possess farms of 300 to 400 bighas, which are tilled for them by landless day-labourers, of whom there are considerable numbers. They are paid either in money or a share in the crop. The wages are 1 to 2 annas a day for men, 1 to 1½ annas for women, and 1 pie to 1 anna for children, who are largely employed in agriculture. The animals used for domestic economy and agriculture are oxen, cows and buffaloes, sheep and goats. Horses are kept only by the wealthy; asses, pigs, and poultry by the lower classes. Kine are only used for draught or milk; none allowed to be slaughtered, on religious

principles. Sheep and goats are kept both for their flesh, milk, and wool. Large herds of cattle are especially kept by Gujars, and ghee, tîre, and butter manufactured. The domestic animals are indigenous; they are strong, healthy and hardy, but of a very inferior breed. Rinderpest seems to have raged once or twice in the memory of the present generation. They are both hand-fed and pastured. *Karab* is sown for them, which is jowâr sown very thick and not weeded. No changes have taken place from time immemorial in agriculture or tillage, nor can any progress take place, as the cultivators are extremely ignorant and conservative. Agriculture is very much esteemed, and, as stated under "Occupations," is practised by the majority of the population.

There are no buildings connected with agriculture. Cattle are enclosed at night in a kind of court-yard in front of the dwelling-house. Corn for domestic use is stored in *kothis*, which are long, cylindrical, earthen cells, made with the hand by Chamâr women.

Hay for the cavalry and State horses is obtained from large grass-preserves at Ikran, Helok, Mandhera, Rúpbâs, and Rasiâ, from which depôts are formed at Dîg, Bhartpur, and Rúpbâs.

There are several large gardens belonging to the State and to private individuals, laid out with walks, Horticulture. &c.; but gardening generally is in an inferior condition even to agriculture. The only vegetables cultivated are some of the cucurbitacæ, &c. Fruits are only found in the public gardens: the most common are orange, lemon, plantain, guava, pomegranate.

Several of the roads are lined with trees, and about the large towns they are planted in considerable numbers, and generally the country is fairly wooded; but fuel is scarce. There are no forests, but several woods, which are State property, and supply fuel and some timber for State use: there is no valuable timber.

Of the total amount of khâlsa land under cultivation, 11,11,864 bîghas are irrigated by rain, 3,09,107 bîghas by wells, and 27,192 by tanks and rivers. Land watered by wells is called *châhi*, and is worth Rs. 2 a bîgha more than land watered by rain or *barâni*. The total number of pucca wells is 9,696, 1,000 of which were constructed during the minority of the present chief by advances made to the cultivators. The wells are of two kinds,—those that can be worked with one pair, and those that can be worked with two pairs of bullocks (*châr-dûwâ*) at the same time. One pair irrigates 20 to 25 bîghas. The system of irrigation by wells is the ordinary one found in Upper India. As there are no perennial rivers, the irrigation from the rivers is more a kind of saturation caused by periodic inundation. The rain-flood of the rivers is held up by embankments called *bande*.

which are found all over the district, and released at the sowing season. The principal of these are the Sīkrī bund in Gopālgarh, which holds up the water of the Rúpárel. It curves round the river in a southerly direction, is 8 miles long, and has 21 masonry outlets. This bund is intended not for holding up, but for distributing the water. The water goes in two directions,—one part flows north-east towards Gopālgarh, Paháří Kandla, and Kámán; and the other south-east, towards Díg, Kumbhír, and Bhartpur. There is no exit for the north-east division, and in years of flood it inundates the whole low country from Paháří to Kámán, a distance of 11 miles; and when it rises high, escapes into the Muttra district and injures the crops. The south-east part flows through the Kho Dehr, near Díg, and a succession of other *jhils* into the Motí Jhíl at Bhartpur, and by the Orim and Khari Nadi into the Bángangá. This bund is of faulty construction, as most of the water is directed to the north-east, where there is no outlet, and a comparatively small area to be saturated, both of which conditions are reversed towards the south-east. The south-east division is held up by another bund at Kakra, after which the water flows over the country and collects in the Kho Dehr, which can only be cultivated in dry years. From Kho Dehr to Motí Jhíl, there being many little falls, a drainage cut is excavated draining the low country. There are two large bunds between Kho Dehr and Bhartpur,—the Gobardhan Gate bund at Díg, which is also the road to Gobardhan, and the Motí Jhíl bund at Bhartpur, which was formerly kept always full, to flood the country round Bhartpur in case of attack.

In connection with the Bángangá the principal bund is the Aján bund. It is 9 miles long, and runs in a north-west direction, its near end being about 4 miles from Bhartpur. It directs half of the water through the *ghanna*, a preserve near Bhartpur, to a hollow close to the south-west of the city. At the end of the rains the water is drained off by two channels leading into the Orin Nadi, one of which passes through the city and supplies the moat, and the other fills tanks on the Agra road.

The Kákand river, after descending from the elevated level described under "Rivers," enters a large valley, 6 miles long by 5 broad, surrounded by hills, little cultivated and suffering a great dearth of water in the hot months, the river not being perennial. It leaves the basin by a valley between the surrounding hills, about 1,250 yards wide. In order to fertilize the valley, a bund across the river, where it emerges, was commenced during the minority of the chief, but, notwithstanding the obvious advantages, has never been completed. The estimate was Rs. 1,31,000, and it was calculated that 9,000 bighas of waste-land would be brought under cultivation by it.

The bunds are mostly earthen works, in some cases faced with stone and masonry outlets. They are kept in repair by the State, in some cases by the zamindars to whom *takávi* advances are made for the purpose. Water is supplied free to all *khálsa* land, but on all other lands, *jágírdári* or *inámi*, a duty of one rupee per *bígha* is levied. The total number of bunds is 126; a list of the principal, with their sources of supply, is as follows:—

Pargana.	Name of Bund.	Remarks.
Díng . .	Nigon, Dhubora, Sahari, Sheshumwalla, Kachawti, Pisopa, Morar, Ghata.	Fed by south-east line of the Rúpárel.
Kámán . .	Nundhera, Chuchurwari, Bolkhora, Kalata, Rosaka.	Fed by north-east line of the Rúpárel;
Pahárl . .	Beisera, Putraili, Allumpur, Satawari.	north part of Pahárl occasionally flooded from Gurgaon.
Gopálgarh .	Síkrí. On the north-east line of the Rúpárel, Ramp, Dabuk, Gangwara, and Gopálgarh. On south-east line, Enlari, Koorkaie, Biyari, Papia, and Kutwari.	
Bhusáwar...	Rhundherpur, Gurha, Booraj, Bhusáwar, Ataripura, Diapur, and Nyagaon.	Fed by local drainage from the adjoining hills.
Wair ...	Jugjiwunpur, Bondagaon, Kota Putti, Bichpuri, Bujera, Isitpura, Lohara, Rajgarh, Soonsa, Ajround, Lalchund, Mohari, Mukrowli, Raipur, Sitagaon, Parya, Putti, Khorí, Morada, Bhuggora, Oomraind and Bhopur, Lalpur and Jewund.	All fed by local drainage from adjoining hills, except two last, which are fed by Bángangá river.
	Bhimnugger, Murki Kalan, Murki Khoond, Kunawar, Bhuggori, Kundera, Khutnaoli and Jisroua, Bagrein, Kyri and Monouli.	Fed by local drainage and the Gambhír.
Uchain and Rudáwal.	Ajan, Kundera, Chowrari, Gujaibalai, Khara, and Domrea.	Three first fed by the Bángangá, last by local drainage.
Rúpárl ...	Mertha, Bokouli	Bángangá and local drainage.

The system of levying and collecting the land-revenue is very similar to that in British districts. A revenue survey was made in 1851-56, after which a summary settlement was effected for three years; in 1859, another was made for four years; and in 1863 a further one for six years, from the expiration of which in 1869 till 1871 the same rates were allowed owing to the general famine. The year following, these rates were enhanced 10 per cent., and in 1873-74 a regular settlement for ten years was introduced, by which the total land revenue has risen to Rs. 20,16,581, being an increase of Rs. 3,26,382 over the previous settlement. The ryots, who are the actual cultivators, pay to the zamindar in money and kind, and the

zamindar pays the Ráj share in money only, by two instalments in the year, after the rabi and kharíf harvests, to the patwári, who makes the money over to the tahsildar, by whom it is sent under a guard to the treasury.

The rate of assessment per bigha varies in the different parganas as under :—

Pargana.	Amount of assessment.			
	Rs.	A.	P.	
1. Wair	1	3	6½	per bigha.
2. Rúpbás	1	5	9	"
3. Uchain	1	4	6½	"
4. Naga	0	15	1½	"
5. Bhusáwar	1	1	10	"
6. Akhaigarh	0	15	5	"
7. Biána	1	1	8½	"
8. Kámán	1	2	6	"
9. Gopálgarh	1	13	8	"
10. Pahárá	1	5	6½	"
11. Díg	0	15	0½	"
12. Kumbhír	1	1	0	"
13. Deorhi	1	4	2	"
14. Salt Tahsil	1	2	11	"

The assessment being one-sixth of the produce, from this the *hák mukadami* of one-third is deducted; the actual assessment is only one-ninth. Thus, $\frac{1}{6} - \frac{1}{3}$ of $\frac{1}{6} = \frac{1}{9}$. By this settlement the total amount of assessment, without deducting the *hák mukadami* in all khálsa land in the State, calculated by taking one-sixth of the average produce, was Rs. 32,28,553-4, which, multiplied by 6, will give the total annual produce of khálsa lands, viz., Rs. 1,93,71,319-8.

The total amount of cultivated khálsa land is 16,92,892 bighas, the average actual assessment of which is Rs. 1-3 per bigha, and the average produce value Rs. 10-11 per bigha. The amount of uncultivable waste is 5,88,174 bighas 18 biswas; of culturable waste 2,46,803 bighas 3 biswas; of rent-free holdings 2,65,912 bighas 9 biswas—making a grand total area of 27,93,782 bighas 11½ biswas, or 1,263,403 acres 28 perches.

The land tenures in Bhartpur may be divided into two classes —*zamindari* and *muáfi*, or rent-holdings and free-holdings.

The amount of khálsa or Crown land is greater in proportion in Bhartpur than in the other States of Rájputáná, and is continually being increased by the lapse of *jágírs* which have ceased to be granted for a long period. In 1874, the total amount of *muáfi* land was 2,65,912 bighas, with a revenue of Rs. 3,18,980. The khálsa land is farmed out by the zamindars to the ryots, who are the actual cultivators. The tenures between them are of two

kinds: the ryots are either tenants-at-will or lease-holders. In the former case, there seems to be a kind of tenant-right established by custom in some places, so that the ryots are not usually evicted without fault. The leases are for short terms of two, three, or five years. The zamindar cannot raise the rent above the amount prescribed by the settlement. The rent paid by the ryot—that is, the full assessment of one-sixth without the deduction of the *hák zamindari* and the zamindar's share of one-twelfth—varies from Rs. 4-2-9 per bigha in Gopálgarh to Rs. 2-1-10 per bigha in Díg, the respective produce value of each being Rs. 16-11 and Rs. 8-5-4½. The ryot pays his rent in either money or kind (generally the former) to the zamindar, except in case the land has passed into the hands of an intermediate holder on account of the *sadr zamindar* mortgaging his rights: such cases are said to be comparatively rare: or in case the zamindar alienates his rights as a kind of *jágír* for religious purposes, which sometimes occurs.

The zamindar has a kind of hereditary claim established by custom; he is accountable for the payment of the revenue to the State, and is not disturbed so long as he pays it.

Muáfi tenures are of three kinds—*jágír*, *inám*, and *pun*.

The total value of *jágír* lands is Rs. 1,76,694. They are hereditary, and pay no revenue to the Ráj. The *jágírdárs* do not seem to have the power of adoption without the consent of the Darbár, and the degree of consanguinity entitling inheritance seems also subject to the same. The zamindars and ryots under the *jágírdárs* are in the same position and condition as those under the *khálsa*. The *jágírdár* has not power to dispossess the hereditary zamindar without fault, and cannot increase the rent over the settlement.

Inám tenures are in lieu of military service to the State. The share per matchlock is 30 bighas. The revenue of these lands is Rs. 95,772, and the number of men (or matchlocks) they are bound to furnish in case they are called out, 1,876: when in service they receive pay at the rate of four pice a day. On ordinary occasions only two-thirds are called on to serve, one-third remaining to cultivate.

Pun villages, valued at Rs. 46,514, are endowments for the support of temples and other religious and charitable institutions.

A table follows, showing in detail the *khálsa* and *muáfi* villages in each pargana.

*Statement showing the number of Khálsa and Muáfi Villages in the
Bhartpur State.*

No.	PARGANAS.	Crown.	ALIENATIONS, BEING TENURES HELD RENT-FREE.				Grand total.	REMARKS.
			Religious en- dowments.	In lieu of ser- vice.	In perpetuity.	Total.		
1	Bhusáwar	75	5	3	11	19	91	Temple and other charities ... 5 Játs 13 Banyas 1
2	Blána	147	4	3	17	24	171	Temple and other charities ... 4 Játs 18 Bráhmans 2
3	Wair	38	1	...	2	3	41	Temple and other charities ... 1 Játs 2
4	Uchain and Rudáwul ...	70	1	6	12	19	89	Temple and other charities ... 1 Játs 10 Banyas 1 Muhammadans 1
5	Kámán	112	7	...	1	8	120	Temple and other charities ... 7 Játs 1
6	Díg	92	3	17	5	25	117	Temple and other charities ... 3 Játs 17 Gujars 4 Banyas 1
7	Akhaigarh	77	3	3	12	18	95	Temple and other charities ... 3 Játs 14 Bráhmans 1
8	Gopálgarh	133	4	...	1	5	138	Temple and other charities ... 4 Gujars 1
9	Pahárf	85	...	...	...	...	85	All Crown property.
10	Salt villages	10	...	...	...	...	10	The land revenue of these is debited in the Salt Department.
11	Rápbás	65	3	...	...	3	68	Temple and other charities ... 3
12	Naga	76	...	1	2	3	79	Játs 3
13	Kumbhár	62	3	8	8	19	81	Temple and other charities ... 3 Gujars 2 Játs 14
14	Bhartpur	132	11	9	29	49	181	Temple and other charities ... 11 Gujars 1 Játs 25 Muhammadans 5 Bráhmans 4 Banyas 1 Bhats 1 Mirasis 1
GRAND TOTAL ...		1,174	45	50	100	195	1,369	

Population, Castes, Tribes, and state of Society.—The population of Bhartpur was formerly estimated at 600,000 by allowing 300 to the square mile: Captain Nixon made the first rough census in 1855-56. A regular census was taken by the Political Agent on the 10th July 1867, and was considered by him to be fairly correct, possibly rather under than over rating the population. As nothing further since has been done, this census is here given (page 159), though in the Annual Report of 1873-74 it is stated

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that there is reason to believe that since this census the population has increased, but no reason is given.

There were only 76·28 girls per cent. of boys. The reasons assigned for the disproportion are, that female children being uncared-for, their mortality is greater, the inaccuracy of the statistics, and the native dislike to give any information relative to females. The crime of infanticide, which was formerly common among the Játs, especially the Thákurs, is said to have altogether died out, principally through the instrumentality of Mahárájá Balwant Singh. Among other ways for the protecting of female children, he doubled for the marriage of a girl the amount known in the State as *ghor* or "bounty-money," which the Thákurs receive from the Darbár towards defraying the marriage expenses of their children.

The total number of Hindus	...	...	630,242
" " Musalmáns	...	...	113,445
Musalmáns to Hindus	...	...	18 per cent.

Of Hindus there are 326,604 cultivators and 303,638 non-cultivators. Of the total population, Játs are 122,989, or 19·51 per cent. ; Gujars 46,865 ; and Banyas 106,799, or 16·95 per cent. Of Musalmáns, 58,375 are cultivators and 55,070 non-cultivators ; to the former class belong the Meos, who number 47,476, or 11·84 per cent.

Of the total population, 384,979, or 51·76 per cent., are cultivators. In addition to the castes mentioned above, the population consists of Bráhmans, Mínas, and miscellaneous castes, of which latter the Chamárs and Málís are probably the most numerous. The approximate proportions are as under :—

Miscellaneous	...	...	...	30 per cent.
Játs	...	...	...	19½ "
Musalmáns	...	...	...	18 "
Banyas	...	...	...	17 "
Gujars	...	...	...	7 "
Bráhmans	...	...	...	6½ "
Mínas	...	...	...	2 "

Even allowing that the population has increased, the census may be considered as fairly representing the proportion at present, and nothing as trustworthy can be substituted showing the whole population.

Census of Bharatpur taken 10th July 1867.

(159)

District.	PARGANA.	Number of mouzas or townships.	Area in British statute square miles of 640 acres each.	POPULATION.			Number of persons to each British statute square mile.	PROPORTION OF MALES TO FEMALES.		Number of houses.	Average number of persons to each house.	REMARKS.
				Total.	Males.	Females.		Males.	Females.			
1	2	3	4	5	6	7	8	9	10	11	12	13
Bharatpur.	Akhaigarh ...	91	141.36	51,294	27,697	23,597	362.86	100.00	85.20	6,653	7.73	
	Bharatpur ...	179	257.12	144,770	78,470	66,309	563.08	...	84.50	23,753	6.10	
	Bhusaſwar ...	87	127.81	50,390	27,278	23,114	394.23	...	84.74	5,043	8.47	
	Biāna ...	173	300.98	76,347	41,919	34,429	253.00	...	82.13	8,277	9.22	
	Ballabgarh...	14	22.93	9,999	5,395	4,604	436.07	...	85.34	1,223	8.17	
	Dig ...	112	194.48	77,003	41,761	35,242	395.94	...	84.39	9,002	7.70	
	Gopdagarh ...	142	145.29	50,794	27,224	23,570	349.00	...	86.53	12,631	4.01	
	Kumbhur ...	102	101.59	69,587	37,236	32,351	430.64	...	86.89	8,640	8.07	
	Kāman ...	121	131.74	43,116	23,045	20,071	327.29	...	87.69	5,147	8.37	
	Naga ...	80	80.75	29,567	16,124	13,443	366.15	...	83.37	3,470	8.52	
	Uchain ...	91	129.24	50,504	27,104	23,400	390.78	...	86.33	11,714	4.31	
	Pahāri ...	77	101.50	31,427	16,844	14,583	309.63	...	86.53	3,837	8.14	
	Rāpās ...	68	115.87	36,322	19,879	16,443	313.47	...	82.71	9,607	3.75	
	Wair ...	34	63.41	22,582	12,133	10,449	356.13	...	86.12	3,169	7.12	
	TOTAL ...	1,371	1,974.07	743,710	402,106	341,604	376.74	100.00	84.95	114,116	6.51	

The inhabitants of the territory are entirely Hindus or Muhammadans, the only Europeans being those connected with the Government Agency. Immigration is limited, being confined to a few, either Musalmáns or Hindus, who are employed in some trade or profession.

The following is a description of the Hindu castes in Bhartpur in the local order of precedence, with their occupations, condition, and numbers as far as possible:—

Occupations.—The Bráhmans are very numerous in the public and private services, from the highest to the lowest ranks; they of course perform all the orthodox ritual of the country; and a great many live by landholding and cultivation.

The number is about 7 per cent. to the population. The Bráhman caste is divided into many clans and families, which can neither eat together nor intermarry. The two great divisions of Bráhmans are the Panch Gaur and the Panch Dravir. Of the Panch Gaur Bráhmans, *i.e.*, Bráhmans who belong to the countries north of the Vindhya and worship Vishnu, are the following clans;—

Gaur	Numerous; from Gaur, the ancient capital of Bengal.
Kanyakubja	A few; eat flesh.
Utkal	A few; priests of Jagannáth.
Sarsute	Numerous.
Maithul.	A few.

Of the Panch Dravir Bráhmans who belong to the countries south of the Vindhyas and worship Siva, are—

Gujráti or Nágar	Some.
Dravir	(?) From an ancient town of that name near the Narbada river.
Maháráshtr	Dekhani or Maratha; few.
Tilangu	(?) From Tilang, an ancient town.
Karnatic	(?) From the Karnatic.

There are very many inferior clans, some of questionable status and descent. Of the Kanyakubja clan there are four sub-divisions which do not eat meat.

There was formerly an offshoot of a nomad, pastoral tribe of Banjáras, who wander in Central India, called Haiwasas; but they seem to have entirely gone to Karauli. The Pahári Bráhmans are fairly represented, almost entirely by Kashmiris in the employ of the Darbár. No information can be given with regard to several of the clans and families. It is not probable that all given are found in Bhartpur.

Occupation—military service, servants, agriculture. Condition
 Kshatrya. —poor, and few in number, being confined
 to a few Rájputés of the Chohán, Rathor,
 Narúka, and Kachhwáha clans.

This caste, with the Gujars and Mínas, asserts some claim
 Játs. to be included in the category of the
 Kshatryas. The Játs and Gujars, as well
 as the Ahírs, smoke together, and eat out of the same pot, but
 not out of the same dish. Widows are sold indiscriminately
 among the three castes (*dharecha*), the sons of whom are
 legitimate. The Játs, being the dominant class and the caste
 of the ruling family, deserve a fuller account. Occupation—
 arms, Government appointments, and agriculture. As might be
 supposed, they have the best appointments: the cultivators are
 fairly off. Number—122,989.

The Játs, like all other Hindu tribes (except Bráhmans) who
 have been successful in war, or whose chiefs have established a
 dominion, claim to be of Rájput blood. The popular tradition
 of their origin is that they are derived from the Rájput Chander-
 bansis or Yadus of Karauli. According to this legend, Sindpal,
 seventeenth in descent from Krishna, was the common ancestor of
 both Karauli and Bhartpur, twenty-five generations after whom
 the caste was first distinguished by the appellation of Játs, from
 their practising the custom of *dharecha*—that is, irregular or left-
 handed marriage; and the inference seems to be, that the Játs are
 the offspring of such marriages, and are Rájputés of half-blood.
 But it may be guessed that the tradition was invented in order to
 give a rising tribe rank among the patrician clans.

Among those of Bhartpur, there are six principal clans called
 Dúng, namely, Sinsinwar, so called from the town of Sinsini, the
 residence of Bal Chand, the first ruler of the Játs in the popular
 account; Khuntail, Chahar, Nohwar, Sogarwar, and Manga.
 The other clans, known as Aooe, are Naharwar, Pachandra,
 Dágur, &c. The distinguishing feature of the Dúngs is that they
 do not practise the custom of keeping a brother's widow, or
dharecha, which the other Játs do, nor do they usually give their
 daughters in marriage to the Aooees, though they marry the
 daughters of the latter. The Játs may practise polygamy and
 left-handed marriage (*dharecha*) at discretion, nor is it necessary
 for them to confine themselves in their choice of wives to their
 immediate clan or caste: a woman of any caste may live with a
 Ját as his wife. With regard to the offspring of the *dharecha*, the
 sons enjoy equal rights of inheritance with those born under the
 marriage ceremony, but the daughters do not. Formerly the
 Dúng Játs practised female infanticide; but this custom is extinct.

Seclusion of women is not practised as a rule; but the better classes, especially the families called Thákurs, who claim descent from Badan Singh, observe the custom.

In physique the Játs are generally of fair height, but below the average of Rájputés or other high castes; their chest measurement and weight are in fair proportion to their height; the extremities, especially the lower, are often disproportionate to their abnormal length. The women are of very strong physique, exceeding the men in this respect proportionately speaking. They are not remarkable for personal beauty, but some have very fine figures. They also are most industrious and contented, working in the fields, &c., but are said to rule their husbands. The prevailing complexion is fair, and the colour of the eyes dark; the hair is dark, fine, and straight; beard and moustachios scanty, and the former not usually worn. The crania are of tolerably fair size and shape, often elongated, so as almost to approach the *dolichocephalic*,—altogether a lower type than the Bráhman skull. Their intellectual faculties are not brilliant, partaking more of shrewdness and cunning than ability. They are said to possess courage and fidelity, are industrious and persevering in their habits, and of an agile and muscular frame.

In religion they are said to be Vaishnava; but most of them kill animals. Krishna is the national and favourite divinity, and is worshipped under various names. Their language is called Brijbháka, a *patois* of Hindí. Education is extremely limited, and even that confined to the upper classes. The only books are those containing essays and verses of a religious and moral nature. With the exception of beef, they can eat animal food of all kinds, and drink spirituous liquor. The use of *bhanga* is general; they use poppy-head, more injurious than opium, and both smoke and chew tobacco. The Játs are found in all parts of Bhartpur, but more especially in the parganas of Bhartpur, Kumbhír, and Díg.

Occupation—Darbár employ, some in high office; arms, and agriculture; agricultural part rather poor.

Gujars.

Number—16,865. They are said to be derived from Rájputés, and are divided into two sections, called Khari and Laur. The former consists of the following clans:—Solania, Thathwaria, Doralia, Sipwar, Niskaria, Súá, and Kharia. Khari Gujars are inferior to the Laur, being principally engaged in making butter and ghee, which their women sell, and which is looked upon by the latter as derogatory. They have a curious custom of making a cow of cowdung, covering it with cotton, and then going through the process of killing it, which, on account of the general veneration for the cow among Hindus, causes them to be further despised by the Laur.

The Laur Gujars are held in consideration, and have the privilege of furnishing nurses for the ruling family; they are divided into the clans of Kumhár, Madi, Kisana, Sirande, Chádri, &c. They neither intermarry nor eat with the Kharis. The Gujars are rather tall and muscular, and are very similar to the Játs in their customs, practising polygamy and *dharecha*. *Parda-nashini* is not general. They also eat animal food and drink liquor. They belong to the Vaishnavites, and pay adoration to Mahadeo, Hanumán, &c.; but the tutelary goddess of the caste is Deoki, to whom a temple has been dedicated at Jhaj in Wair pargana, which attracts a large number of Gujar devotees. Their dialect resembles the Brijbháka, but some words and their pronunciation are peculiar to themselves. They also have a national music which, like the Rasia songs, is said to be understood only by themselves. They live by keeping cattle more than by agriculture, and constitute the sole inhabitants of the Dáng, where they live in a semi-barbarous state, always armed with a spear and sword, even while herding their cattle. They are said to be inferior to the Játs and Mínas as agriculturists, and were formerly addicted to highway robbery and cattle-lifting; but these crimes have become less since they took to agriculture and military service. Their women do not work in the field. Biána contains the highest number of Gujar villages.

The Mínas also claim irregular descent from the Rájputés, and it is most probable that they are largely of mixed blood. Occupation—arms, servants as chaukidars, and agriculture. Condition—poor. Number—10,000. They are divided into the following clans:—Sanádan, Jhardar, Lohara, Jordar, Gasika, Thorat, Bhokira, Satkal, Bardar, Ghilot, and Goadár. They eat flesh and drink spirits, and also practise *dharecha*; their women do not keep the *parda*. They worship Bhairon and Hanumán, swear by the *katár* (dagger), and pay great attention to omens. Formerly they were a predatory tribe; at present there are two classes, the agricultural and the chaukidar Mína; the latter are still addicted to robbery.

Occupation—traders, money-lenders, &c.; official employment as treasurers, patwáris, accountants; some as sepoys. Condition—Well-to-do; many rich. Number—160,799. The principal divisions of the trading classes are—Oswál, Mahesri, Saráogi, Agárwál, Khondchwál, Mahor, Dilwaria, Dhusar. The Paliwals, Saráogis, and Sirimals are Jains.

The miscellaneous castes by craft or profession, which may be called the Sudras, taken together, number about 30 per cent. of the whole population;

The principal gods worshipped by them are Bhairon and Chanwar Debi. A list of the principal Sudra castes found in Bhartpur is given below,* arranged in the local order of precedence, showing occupations and condition. No definite information can be obtained of their respective numbers.

The Kaisths rank first: they are said to be descended from Chitragept, a production of Brahmos, and are divided into twelve clans, *viz.*—Mathur, from Mathura; Bhatnagar, from Bhatner, an ancient town; Sribastah, the name of a Hindu goddess; Sakseina, from a town of that name in the district of Farakhabad; Suratdhaj; Amisht; Gaur, from Gaur, the ancient capital of Bengal; Karan, descendants of Rájá Karan; Balmik, disciple of a saint called Balmiki; Aithana; Kulshrista; and Nigaen. Occupation—writers, pat-wáris, &c.; some few in trade. Condition—all fairly well off. Number—considerable.

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Occupation—practitioners of the Hindu system of medicine.

Baids.

Condition—fairly well off; several have hereditary pensions from the State. Number—few.

ber—few.

Occupation—bards. These are very few, but well off. They are also said to be descended from a Bráhma, and have three clans—Suth,

Bhats.

Bráhma, and have three clans—Suth,

Bandi, and Mangal.

* *List of the principal Sudra castes in Bhartpur.*

No.	Name of Caste.	Occupation.	No.	Name of Caste.	Occupation.
1	Khestris ...	Commerce.	17	Bhurjis ...	Oven-keepers.
2	Sonars ...	Goldsmiths.	18	Godarias ...	Shepherds.
3	Ahírs ...	Coachmen and agriculturists.	19	Kahárs ...	Day-labourers, servants, water-carriers.
4	Rebaris ...	Camel-men and agriculturists.	20	Náís ...	Barbers.
5	Patuas ...	Artisans.	21	Dhobís ...	Washermen.
6	Khattís ...	Carpenters.	22	Khatiks ...	Syces and tumers.
7	Malis, Kachnis.	Agriculturists and gardeners.	23	Dhanaks ...	Syces and swi chetls.
8	Rajkúmhars	Masons.	24	Sikligars ...	Cutlers.
9	Tambolis ...	Betel-sellers.	25	Mechís ...	Shoemakers.
10	Lodhas ...	Tillers and day-labourers.	26	Balhis ...	Syces and tumers.
11	Darzis ...	Tailors.	27	Regars ...	Golders.
12	Lohars ...	Blacksmiths.	28	Chamars ...	Labourers and tanners.
13	Chobdars ...	Messengers.	29	Chimars ...	Blacksmiths.
14	Kúmhars ...	Potters.	30	Shikaris ...	Hunters.
15	Kalals ...	Spirit-sellers.	31	Kols ...	Weavers.
16	Telis ...	Oil-sellers.	32	Natts ...	Acc 1st.
			33	Kanjars ...	Girders.
			34	Bauris ...	Servants.

The total number of Musalmáns, including Mees, is 113,115, or 18 per cent. of the population; of these, 47,176 are Mees. Occupation—agricultural.

Musalmáns.

(100)

ture ; darbár employ, in which some hold high appointments ; army and police, trades and servants. They are found in all conditions, rich and poor ; generally they are fairly well off. Of the two great sects, Shias and Sunnis, the former are much less numerous than the latter, but are well-to-do. They are found in greatest numbers in the villages of Paharsar, Saidpura, Helak, and Rara. Education is much more general and more appreciated among the Musalmáns than the rest of the population ; they are also more intelligent, and inclined to embrace the advantages of civilization.

Some of the communities which went over to Islam from Hinduism in this part of the country still remain grouped under their tribal names, or are known by special denominations. Of these latter, the Kaimkhánis and Malkhánis may be mentioned, but the principal tribal group of converts is the Meos. The country occupied by the Meos is called Mewat ; it is about 100 miles long from north to south, and 80 miles wide from east to west, and extends into the British, Bhartpur, and Alwar territories. The Bhartpur parganas included in Mewat are Pahárá, Gopálgarh, Kámán, and Naga, with a few villages in Díg.

This tribe, which has been known in Hindustan, according to the *Kutab Tawarikh*, for 850 years, was originally Hindu and became Musalmán. The etymology of the name is doubtful. The derivations assigned are from the name of their original country Mewar, or from the presents of fruit (*mewa*) which they were accustomed to offer to the sovereigns of Delhi. Both of these are unworthy of credit. Their origin is also obscure. They themselves claim descent from the Rájput races of Jádon, Kachhwáha, and Tunwár, and they may possibly have some Rájput blood in their veins ; but they are probably, like many other similar tribes, a combination from ruling and various stocks and sources ; and there is reason to believe them very nearly allied to the Mínas, who are certainly a tribe of the same structure and species. The Meos have in Bhartpur twelve clans, or *páls*, the first six of which are identical in name, and claim the same descent as the first six clans of the Mínas. Intermarriage between both was the rule till the time of Akbár, when, owing to an affray at the marriage of a Meo with a Mína, the custom was discontinued. Finally, their mode of life is, or was, similar, as both tribes were once notoriously predatory. It is probable that the original Meos became supplemented by converts to Islam from other castes. It is said that they became converts to Islam at the time of Mahmud Ghaznavi, in the eleventh century, after their conquest by Masud, son of Amir Salar and grandson of Sultan Mahmud Subaktagin by the mother's side, general of Mahmud Ghaznavi's

forces, who is venerated by the Meos, and by whose name they swear.

The twelve clans are named Singal, Nae, Doolote, Dondlote, Chirglote, Sundawat, Ratawat, Durruwal, Khosa, &c.; besides which there are 52 families. They have a mixture of both Musalmán and Hindu customs; they practise circumcision, *niká*, burial of the dead. They make pilgrimages to the tomb of Masud in Baraich in Oudh, and consider the oath taken on his banner the most binding; they also make pilgrimages to shrines in India, but never perform *haj*. Among Hindu customs they observe the Holi, Dewáli; their marriages never take place in the same *gót*, and their daughters cannot inherit; they call their children indiscriminately by both Musalmán and Hindu names. They are almost entirely uneducated, but have bards and musicians, to whom they make large presents. Songs called *ratirai*, on pastoral and agricultural subjects, are common. The dialect is harsh and unpolished, so that no difference can be made when addressing a male or female, or with respect to social distinctions. They are given to the use of intoxicating drink, and are very superstitious and have great faith in omens. The dress of the men and women resembles that of the Hindus. Formerly infanticide was common, but this is said to have entirely died out. They were also formerly robbers by avocation; though improved, they are still noted cattle-lifters. The only approach to caste among them is that the descendants of Lálsingh (who became a fakir and is said to have performed miracles) call themselves *súdh*, cook with a *chauka*, and keep their food and water separate from the other Meos, but intermarry and adopt the other manners and customs of the tribe. Their population is 47,476, all engaged in agriculture.

The physiological characteristics of the Játs, the dominant race, are described under "Castes, Clans, and Tribes." Those of the other castes, being the same in Bhartpur as elsewhere, require no remark. A description of the state of society may begin with marriage. In the following description the Játs are specially alluded to. Polygamy is allowed, but monogamy is the rule, except with the wealthy. It is established by custom that the husband can expel his wife for misconduct, but there is no legal divorce, though a woman can be punished for leaving her husband and associating with another man. Such cases are frequent cause of affrays and murders. The degree of consanguinity within which it is unlawful to marry is popularly expressed by the phrase "*Chár dudh bachte hain*." Children are betrothed at the age of six or seven, which is negotiated through the *naí* or family barber, the parents

trusting implicitly to him. The girl's father never sees his future son-in-law, and avoids him as much as possible. If he accidentally meets him, he gives a present of rupees and clothes to the boy. This continues till the marriage takes place, which is from two to four years after the betrothal.

Marriages are prolific; the average number of children to each is said to be five; plural births are not common. Children are suckled up to the age of one and-a-half or two years. A cradle of basket-work suspended by ropes, in which the children are rocked, is used: opium is generally given. The practice commences almost from the child's birth, and is continued to the age of three or four years, the object of it being to allow the mother to engage in her domestic duties, which are always heavy. The first dentition among the children is always difficult, and the mortality great.

The Játs and Gujars eat little meat; the usual food consists of barley, wheat, and gram, mixed together and made into unleavened cakes, the proportion depending on tastes and means. In the hot season wheat is used by those who can afford it, but, in the cold, bájrí is used universally among rich and poor; dál and vegetables also form part of the general diet. Rice is not usual; it is especially used in marriage ceremonies, when it is mixed with sugar and ghee. Ghee is used by all, milk for the most part by villagers. Three meals are taken,—in the morning *kaláú*, consisting of the remains of the previous night's *chapátis*, with ghee or sugar (the villagers eat wheat or bájrí coarsely pounded, and boiled in butter-milk, *maheri*, before going to their work in the field, or take it with them); at noon, *rasoi-chapátis* with dál and vegetables; and in the evening, *beárú*, the same. The use of intoxicating drugs, especially bhang, is almost universal, but intoxicating liquor is little used.

The dress of the males consists of a dhoti, kamri or jacket, and pichaura or scarf; trousers are sometimes worn. The dress of the females consists of a lahnga or petticoat, angia or bodice, and órhni or mantle. In the cold season, trousers and kamri wadded with cotton are worn—a costume almost peculiar to Bhartpur; the puggri and long-cloth caps are the head-dress.

The females are fond of ornament, and a considerable part of their property consists in jewellery. The men also wear gold chains round the neck if they can afford them; the jewellery is very inferior in design and manufacture. Tattooing is usual, especially among the poorer women,—on the chest, arms, between the eyes, &c.; but the designs seem purely ornamental, not of a religious character.

For games and amusements they have *chausar*, *athára*

kankra ; in villages, dancing and singing with rude music. Meos throw javelins, and some use clubs ; fencing and the use of dumb-bells are common. Mode of travelling consists of *ekkas*, *raths*, &c.—the same as in other parts of India ; camels are not generally used as in other parts of Rájputáná, and saddle-horses are almost confined to the rich.

The sites and large towns are laid out with a tolerable amount of regularity, but the villages are only collections of huts disposed without any order.

Habitation.

In the cities there are many fine houses belonging to wealthy individuals, with handsome façades and balconies of red or white sandstone ; but they require no remark, being the same in design and architecture as those in the upper provinces. The material of which the villagers' houses are built is usually mud, except in the few parganas where stone is plentiful—Rudáwul, Wair, Biána, &c. The houses usually consist of two apartments without windows. Sometimes there is a shed for cattle under the same roof, which is either of mud or thatch. The only attempt at ornament are occasional rude paintings or designs on the front walls. Generally there is in every village a temple, differing but little from the houses, and a few domed cenotaphs in memory of some of the "rude forefathers of the hamlet."

The generality of the population have a competence commensurate with their ideas ; the cultivator especially seems fairly well off and contented, while the traders and officials are all well-to-do, and some of them rich.

Wealth.

The people are industrious, economical, peaceable, and generally contented, with affection for each other and gratitude for benefits ; they are also amenable to laws and fairly honest, but ignorant and extremely conservative in their ideas, applying the maxim "*Quidquid novum falsum*" to everything.

General character.

Of all the occupations, agriculture engages by far the greatest number, nearly 52 per cent. of the whole population being engaged in it. Next to agriculture, commerce is the most usual pursuit ; about 18 per cent. are occupied in it. The principal other occupations which employ the remaining 30 per cent. of the population are religion, army and police, official employment, trades (artisans), manufacture, servants, labourers, beggars, and vagrants.

Occupations.

Commerce and Trade.—Formerly the taxation on merchandise was so excessive as almost to paralyze trade completely, the ill-effects of which continued to be felt for a considerable time after a new system of customs was introduced in 1758.

Though, owing to this new system and the opening up of the country by roads, &c., commerce has considerably increased, still it is neither very extensive nor very flourishing. The following table shows the details of customs for the years Sambat 1922, 1929, and 1931, or A.D. 1865-66, 1872-73, and 1874-75, these years being taken as showing the state of trade until the railway was opened, and since.

The table shows a general decrease of imports, an increase of exports, an increase of through traffic till the railway was established, and after that a decrease of three-fourths, and a slight increase of internal traffic. None of the changes were considerable, with the exception of the fall in the through traffic :—

	1865-66.		1872-73.		1874-75.	
	Amount of traffic.	Duty realized.	Amount of traffic.	Duty realized.	Amount of traffic.	Duty realized.
	Tons.	Rs.	Tons.	Rs.	Tons.	Rs.
Imports	18,488	71,000	19,107	66,127	14,295	65,997
Exports	10,387	32,370	9,390	37,245	30,712	47,008
Through traffic	13,811	81,403	21,161	98,590	4,098	24,264
Internal „	26,507	58,763	18,945	54,170	27,909	64,074
TOTALS	69,223	2,46,536	68,603	2,56,132	77,014	2,01,343

The principal imports are rice, opium, grain, sugar, piece-goods, metals; and the exports, grain and cotton. A considerable part of Bhartpur grain goes west towards Jaipur, &c.; while, on the other side, a considerable amount is imported from British territory. There are no means available of estimating the value of the exports and imports.

Commerce, which is seen to be domestic, foreign and transit, is in the hands of banyas and some Bráhmans and Musalmáns; it is carried on in permanent markets, the chief seats being the large towns: very little is done at fairs or religious festivals.

Rice, grain, sugar, piece-goods, and metals are imported from British territory, opium and grain from Jaipur; cotton and salt are exported to British territory, grain to Jaipur and Karauli.

The medium of exchange is coin in rupees or húndis; Imperial Government notes are not common. Merchandise is entirely conveyed by land carriage, there being no water-communication; the carriage is either by carts and the railway, or pack-animals, bullocks and camels; the former especially in the trade with Karauli. The roads are in fair repair, but the rate of conveyance is slow. The expense of a cart and pair of bullocks engaged in this kind of trade is 14 annas per diem. The balance of trade is against the State, the imports exceeding the exports; but the difference between them is decreasing, as is seen by the table.

There are no extensive bankers in the State: the Muttra Seths have an agent who is the principal. Loans are chiefly conducted by banyas. The rates of interest are, in large transactions, 12 per cent. ; in small, 24 per cent. Money is considered to be worth at least 12 per cent.

All those engaged in commerce are fairly well off; some have made considerable fortunes, especially in the salt trade, which, with grain, has the most extensive merchants. There is one joint-stock company of cloth merchants in Bhartpur, with a fixed price for everything, which deserves to be mentioned as unique of its kind. Money is generally hoarded or invested in jewellery; sometimes lent on interest or placed in further investments.

Trades demand little attention, being confined to the ordinary
carpenters, smiths, goldsmiths, stone-
cutters, tanners, dyers, and potters; the
 number engaged in which is considerable, and they are generally fairly well off. The manufactures are very few. Naga has a manufacture of earthenware and clay-pipes called *goorguras*. Some coarse fabric, called *garha*, is made in Bhusáwar, which is considered of a good quality. The manufacture of salt and chowris alone is remarkable. The art of making one kind of chowris is entirely confined to Bhartpur; they are made by a few families in the employ of the Darbár, who keep the process a profound secret. The handles, which are handsomely ornamented, are of sandal-wood, ivory, silver, &c. The secret is the process by which the tail is made; it is composed of long, straight, round fibres of either ivory or sandal-wood, which in good chowris are almost as fine as the ordinary horse-hair.

The number solely employed in manufacture is small, but it is impossible to determine accurately. Salt was, till recent years, manufactured in large quantities within the Bhartpur State, out of the brine drawn from saline wells. Under the latest revenue arrangements with the Government of India, these works have been closed; they were being rapidly superseded by the railway-borne salt from Sámbar.

Administration.—The armed strength of Bhartpur consists of
6,710 men, or, including tahsil sepoy
(who have been described under "Police"),
 10,210, of which 250 are artillery, 1,160 cavalry, and 5,000 infantry, or, if the tahsil sepoy and infamis are included, 8,500.

The *risalas*, or cavalry regiments, formerly formed distinct regiments under the command of the Risaldar, but latterly the best of them have been formed into one large regiment, or sort of brigade, over 1,000 strong. The present Maharája takes great interest in the cavalry, and has improved them very much by having regular parades, and introducing a better system of drill.

Altogether they are considered among the best of any cavalry possessed by Native States.

The Mahárájá retains in his own hands the power of inflicting capital punishment, and the *ijlās-khás* is the highest court of appeal. The State Council forms a court of appeal from all subordinate courts except that of the collector of revenue and the munsarim of the *Deorhi* or *Zenana* domains.

Judicial system.

The treasury is under a treasurer; and the accounts branch, which in this State is very important, comprising audit, pay controller's department, &c., under dewans. Bills are made out and certified to in the accounts department and submitted to the *ijlās-khás* for sanction, and, after again being sent to the accounts department for record and receipt, are payable at the treasury. The sources of State revenue are land and irrigation revenue, customs, salt, excise, stamps, and miscellaneous. Land and irrigation revenue have been fully described under their respective headings; the customs department is under an official called the collector of customs, subordinate to the State Council. The rates are uniform for transit, external and internal traffic. The revenue from salt is described under "Trades and Manufactures."

Finance.

The average yearly income from excise is about Rs. 5,000, and is included under "Customs." The monopoly for the sale of country spirits is farmed out for a certain number of years: there is no tax on intoxicating drugs.

Excise.

The yearly average income from the sale of stamps is Rs. 80,000; it is grouped under "Administration and Public Departments;" there is also a cess of one per cent. for educational purposes, one per cent. road cess, and a small amount realized from duty on bullion brought to the mint. A statement is given (page 177) showing the detailed revenue and expenditure for the years 1863-64 and 1873-74, the latest obtainable.

For judicial administration the State is divided into two parts. The northern division comprises the five parganas forming Mewat, namely, Díg, Kámán, Gopálgarh, Pahárá, and Naga, containing 653·76 square miles and 518 villages; the southern includes eight parganas—Kumbhír, Akhaigarh, Bhusáwar, Wair, Biána, Uchain, Rudáwul, and Rúpbás, comprising 1,300 square miles and 642 villages. The former division is under the jurisdiction of the Magistrate of Díg, and the latter under that of the Magistrate of Bhartpur. Both have the same powers. In criminal cases they can award imprisonment of both kinds up to three years and fine up to Rs. 50. In civil cases their power is unlimited; an appeal from their decision lies to the State Council.

In each pargana there are subject to the magistrate a tahsildar and thanadar—the former with some magisterial, the latter with police, powers.

For the city of Bhartpur there is, subordinate to the magistrate of the division, a civil judge, who can decide all suits under Rs. 500.

The Salt and Customs Departments are under the jurisdiction of two officials subordinate to the State Council. Revenue cases are under the collector of revenue, who has undefined powers, subject direct to the *ijlās-khās*.

In the courts of justice the mode of procedure resembles somewhat that of the courts in British territory; and the Indian Penal Code is said to be pretty fairly followed.

Death has not been inflicted for some years: imprisonment, stripes, and fines are usually awarded: the punishment of offences by fines is the favourite.

Education is under the Superintendent of Schools and Jails.

The total number of schools is 228, *viz.*, Bhartpur head school 1, 12 tahsili and 215 halkabandi schools; of teachers 279, and of scholars 4,610. The total cost of the institutions is Rs. 21,055-5. In 1863 the total number was 19—the Bhartpur school, 12 tahsili and 6 halkabandi schools, with 935 boys. In 1868 there was a total of 89—the Bhartpur school, 13 tahsili, 73 halkabandi and 2 girls' schools, with 2,117 scholars; and the total cost Rs. 11,165-2. Some English, Sanskrit, Arabic, and Persian, with a little geography, history, and elementary mathematics, as well as Urdu and Hindi, is taught. The staff consists of 19 teachers at from Rs. 8 to Rs. 20 per mensem each. A considerable number of the pupils get appointments as writers, &c., in the several offices. There is also a lithographic press attached to the school for printing educational books and forms, &c., for other institutions.

The Mahārājā encourages industry, and promotes emulation by giving prizes and scholarships: but the boys rarely remain long enough to receive anything like a fair education in any branch.

The standard in the tahsili schools is generally Hindi, Urdu, and a little arithmetic. In the halkabandi schools the teacher receives Rs. 5 a month, and teaches a little Hindi and accounts.

The number of jails in the Bhartpur State is three—one, the central jail at Sear, three miles from Bhartpur; another in the fort of Bhartpur; and the third in the fort of Dig. They are under the Superintendent of Schools and Jails. The central jail is built on the reformatory system, and was intended to accommodate 300 prisoners. Discipline and hygienic measures are fairly carried out so far as is possible.

but the prison is not healthy, owing to faulty construction and occasional overcrowding. The prisoners are employed at extra-mural labour and making paper and ropes ; the women grind corn for the use of the jail. The punishments inflicted are confining to cells, retrenching the daily ration, and, in extreme cases, flogging ; but breaches of discipline are rare. Nearly all descriptions of crime are represented : the most common are theft, robbery, and cattle-lifting. There is no special crime characteristic of the district, and there is no marked tendency towards criminal courses among the people. The prisoners belong principally to the agricultural classes, or to the lower orders ; about one per cent. have received any education. The proportion of females is 16 per cent. ; they have increased 2 per cent. within the last three years.

The proportion of juveniles under fifteen years of age is only 1·6 per cent.

The jail in the fort is used for confining out-working gangs from the central jail and for prisoners under trial. The hygienic arrangements here are inferior even to those in Sewar, especially in the case of those under trial : the water-supply is from the ditch of the fort.

The jail at Díg has accommodation for 40 prisoners, and is used only for prisoners under six months' sentence.

During 1875 the daily average number of sick was 36·6, or 11·2 per cent. of the daily average number (325·8) of prisoners ; and the total number of deaths was 4·0 per cent. of the total number (891) confined. The total cost last year was Rs. 19,592, which includes diet, clothing, jail establishment, repairs, &c., or Rs. 66-6-6 per prisoner ; and the total value of jail manufactures Rs. 10,236-2, or Rs. 34-11-3 per prisoner.

Of the total number (891) confined in the jail last year, 557 were released, 36 died, and 298 remained. The following table gives some statistics for a term of years :—

						Number of prisoners confined in		
						1866.	1870.	1875.
Castes.								
Hindus.	Bráhmans	...	...	...	...	18	35	59
	Banyas	...	...	...	...	13	20	32
	Játs	...	...	...	...	66	117	135
	Gujars	...	...	...	...	51	95	110
	Thákurs	...	...	...	...	25	29	40
	Mínas	...	...	...	...	59	103	170
	Ko lis	...	...	...	...	4	15	17
	Chamárs	...	...	...	...	11	26	3
	Others	...	...	...	...	55	109	185
Total Hindus						302	549	751
„ Musalmáns						54	75	140
GRAND TOTAL						356	624	891

The total number of police of all kinds and denominations is 3,847, as follows :—

Police.				
Bhartpur City Police	...	...	...	302
Chaukidars, Rural	...	...	...	1,505
Tahsil sepoy, 100 men, and 2 jamadars to each lakh of revenue	...	...	...	2,040

The police in Bhartpur and other large towns have a uniform like those in British territory, and are somewhat similarly organized under the orders of the kotwal or the thánadars: they are also fairly efficient. The city police get Rs. 5 a month, 4 annas of which is deducted to form a fund to compensate for robberies in the city not traced. Of the rural police, those in the headquarters of the parganas get pay from the Darbár, and in some cases hold land and receive perquisites from the inhabitants in addition. The village chaukidars get no pay, but hold land and get certain perquisites from the zamindars. They are responsible for all robberies, and have to compensate for losses in case the property is not forthcoming. The tahsil sepoy receive Rs. 3-8 a month, and their jamadars Rs. 5 to Rs. 7. They do both police and revenue duty.

Medical institutions.

The medical institutions are under the superintendence of the Agency Surgeon; a hospital has been established at Anáh, one mile from the city, containing about 50 beds: there is a part screened off for females, and a separate building with accommodation for special cases. The hospital is horse-shoe shape, with the administration in the centre; it is fairly adapted for its purpose, and in a tolerable state of repair, with a fair supply of medicines procured direct from England, and some instruments and appliances, and a sufficient establishment of subordinates and servants. Not only are the patients themselves fed by the Ráj, but also the friends who accompany them. There are also dispensaries in the following towns :—Pahári, Kámán, Dig, Gopálgarh, Naga, Akhaigarh, Rúphás, Wair, Biána, Rudáwul, and Bhartpur City; the establishment of each consists of a native doctor with a dresser and compounder, and some Hindustani and a nominal amount of English medicines, with a few instruments and appliances. Except in a few instances, there is no accommodation for in-patients. Registers of patients and of rainfall are kept up, and monthly returns forwarded to the Superintendent-General for Rájputáná. One section of the jail is devoted for a hospital; it differs in no respect from the other sections; and is also used as a lunatic asylum.

Vaccination is performed both by special vaccinators and by the native doctors attached to the dispensaries, and much trouble has

been taken to introduce it thoroughly, it being unpopular with the people and little encouraged by the authorities. The total number of cases treated in 1875 was 64,821; in 1869, 83,620; in 1872, 67,805. It is probable that the apparent decrease is due to more correct registration. The number of deaths in 1875 was 316, or 0·48 per cent. of the total treated. The total cost of the institutions in 1875 was Rs. 10,339-7-9, or 2 annas 6 pies per head.

The average percentages of the total for four years of the following diseases treated are,—fever 17·12, rheumatism 8·72, chest affections 3·76, dysentery 2·5, syphilis 1. Occasional severe epidemics of cholera and small-pox occur; in that of 1875, 1,668 cases were reported, and 894 deaths.

Sickness is popularly attributed to *khor*, or agency of the souls of departed relations, and for treatment they call in a cunning man, who propitiates the *khor* by offering sweetmeats, milk, &c., and gives burnt ash and black pepper sanctified by charms to the patient.

Hakíms and baidas are in considerable numbers; several of them have allowances from the Darbár. The hakíms practise the *Yunani* system, and the baidas the Hindu. Both these systems, notwithstanding how much they are despised, if understood by those who follow them, would be productive of material benefit, especially in Native States.

Communications.—The State is well provided with the means of communication. It is traversed by the two main roads from north to south and from east to west, the greater part of which are metalled and in good order. All the towns off the main lines are connected with them by good country roads. The main road from Agra to Ahmedabad, *viâ* Jaipur and Ajmer, passes through Bhartpur territory from east to west, and is all metalled and in a state of repair. This is one of the principal trade routes. Of the northern road, the part between Bhartpur and Kámán, *viâ* Díg, is metalled, and of the southern as far as Uchain, while the remainder between Uchain and Biána is being metalled. There are other metalled roads connecting the capital with Agra, Muttra, and Fathepur Síkrí, besides station roads, and between Díg and Muttra, *viâ* Gobardhan; also between Díg and the Alwar frontier, *viâ* Naga.

Of the unmetalled roads the principal trade route is that from Agra to Karauli, *viâ* Fathepur Síkrí, Khánwa, Biána, and Hindaun. Altogether there are 165 miles of metalled road in the State, and 85 miles of unmetalled, the details of which are given in the following statement. The roads are kept in repair by the Darbár; no toll is levied. There are camel carriages for passengers between Bhartpur and Díg; besides which, there is no public conveyance.

LIST OF ROADS.

Metalled.

	Miles.	Miles.
Agra and Ahmedabad road	45	
Bhartpur and Díg	21	
Díg and Kámán	13	
Díg and Alwar	26	
Bhartpur and Muttra	8	
Díg and Muttra	4	
Bhartpur and Fathepur Síkrí	9	
Bhartpur and Hindaun	15	
Sewar and Helak station	5	
Circle road round town of Bhartpur	6	
Residency and Sewar road	3	
Residency and Keoladeso temple	3	
Other station roads	7	

Carried over 165

Unmetalled.

Bhartpur and Hindaun road	19	
Díg and Nádbai	22	
Kámán and Gopálgarh	14	
Biána and Jagner	20	
Bhartpur and Gobardhan	10	
	—	85

TOTAL MILEAGE 250

There is only one staging-bungalow, that of Bhartpur, and it is kept up by the Darbár. The Government staging-bungalow at Halaina, on the main road to Jaipur, was dismantled this year, as there was no further necessity for it since the completion of the railway.

The Rájputáná State Railway traverses the territory about the middle from east to west for 38 miles, and has four stations in the district—namely (from east to west), Ikrán, Bhartpur, Helak, and Nádbai.

The Imperial Post Office is under the Chief Inspector of Post Offices in Rájputáná and in the Ajmer Division. The post-master of Bhartpur has control over the other offices at Kumbhír, Díg, and Kámán.

There are four postal lines traversing the State—

Agra to Ajmer	By rail.
Bhartpur to Kámán, via Díg and Kum- bhír	By runners.
Bhartpur to Muttra	Dígo.
Díg to Muttra	Dígo.

There is a local post which carries all letters to the district for half-anna each, without reference to weight or distance.

There is one telegraph-office only, that at Bhartpur.

Statement showing the Receipts and Expenditure of the Bhartpur State, comparatively, for the years 1863-64 and 1873-74.

RECEIPTS.	1863-64.		1873-74.		EXPENDITURE.	1863-64.		1873-74.	
	Rs.	A. P.	Rs.	A. P.		Rs.	A. P.	Rs.	A. P.
Land-revenue	18,26,442	13 9	18,02,043	0 0	Land-revenue	1,88,712	1 0	1,79,321	11 0
Other items of income from parganas	...	...	4,62,538	5 3	Salt	14,902	9 3	8,575	10 9
Salt	...	...	& 89 G.M.	...	Customs	53,734	7 9	34,903	13 0
Customs	2,50,828	12 0	2,53,590	5 9	Administration and public departments	1,05,113	8 3	77,621	0 9
Administration and public departments	2,46,608	2 0	2,28,378	13 3	Roads and irrigation-works	1,42,788	6 0	2,02,203	6 3
Public Works Department	22,719	11 0	42,643	1 6	Public Works Department	97,730	15 3	2,38,159	8 9
Mint	3,838	13 6	8,416	10 9	Army	8,21,821	12 6	7,96,059	10 9
Birth of the Heir-Apparent	3,251	0 6	2,111	11 0	Civil List	2,70,173	7 6	2,15,421	14 0
Miscellaneous	...	...	719	0 3	Religious and charitable grants	1,00,907	4 3	1,00,847	1 0
	2,088	10 9	...	...	Pensions	16,016	7 9	39,399	7 3
	...	...	...	...	Police	1,21,762	11 3	1,20,052	15 0
	...	...	...	...	Education	11,817	11 6	21,497	14 3
	...	...	...	...	Medical services	15,348	3 0	16,855	7 9
	...	...	...	...	Stationery	4,615	4 0	3,609	3 3
	...	...	...	...	Foreign services	13,867	14 0	17,707	9 9
	...	...	...	...	Birth of the Heir-Apparent...	...	...	2,539	6 3
	...	...	...	...	Other Darbar establishments	5,08,794	1 3	4,74,371	1 0
	...	...	...	...	Miscellaneous	1,82,152	7 6	1,57,868	6 0
	...	...	...	...		26,73,259	4 0	27,07,915	2 9
Total Rupees	23,55,777	15 6	28,00,440	15 9	Total Rupees	1,27,174	14 9	52 G.M.	...
	...	...	89 G.M.	...	Expenditure on the Deorhi	74,200	8 0	2,63,153	7 3
Receipts of Deorhi villages	1,27,174	14 9	2,69,693	6 3	Advances to cultivators	...	...	80,420	14 3
Advances to cultivators	1,04,801	10 6	1,00,060	5 3	Loans	17,672	4 3	...	...
	...	...	8 G.M.	...		...	...	...	...
Loans	41,309	8 3	...	...		...	...	...	...

GRAND TOTAL	26,29,064	1 0	31,70,19	411 3	GRAND TOTAL	28,91,306	15 0	30,51,489	8 3
	...	...	& 97 G.M.	...		...	...	G.M.	...

Principal Towns, Fairs, and Remarkable Places.—The principal towns, in regard to population and trade, are—

Biána.	Kámán.
Díg.	Wair.
Kumbhír.	

At Bhartpur, Rúpbás, Wair, and Berinabad there are considerable fairs and religious gatherings held annually.

Among antiquities may be mentioned the ruins at Kámán which originally belonged to Jaipur, but was enlarged by Ráji Kamsen, from whom it takes its name. It has a large number of dilapidated remains, among which is a curious temple consisting of 84 pillars on which the figure of Buddha is carved.

In Rúpbás is a palace in the Mughal style of architecture with a large tank attached, said to have been built by a member of the family of the Mewar chiefs, who became a Muhammadan in the time of Akbár. There are also in the vicinity three colossal Pandava images of Baldeoji, his wife, and Yudishtra; two enormous stone *láths* or obelisks, the inscriptions of which are illegible; as also colossal images supposed to represent some Buddhist or Jain divinity.

In point of antiquity, and the variety and numbers of its ruins, the town of Biána is pre-eminent. Its fort, built on a range of hills, was esteemed one of the strongholds of India, and the bulwark of Jadou dominion. It has a high monolith with an inscription which is too high to be deciphered from the ground. The fort was taken by Mosud Salar Ghaznavi from the Jadou Ráji, Bijey Pal; it is in a very strong natural position, and its supply of water is obtained from a tank inside. There are other extensive remains of ancient buildings and Muhammadan tombs with Arabic inscriptions, one of which is known by the appellation of "Abu Kandahar," or tomb of Abubakr Kandahari.

GAZETTEER OF BIKANIR.*

General Topography.—The Rájput State of Bikanir is situated between $27^{\circ} 30'$ and $29^{\circ} 55'$ latitude, and $72^{\circ} 30'$ and $75^{\circ} 40'$ longitude. Its area is about 22,340 square miles. It is bounded on the north by Baháwalpur, a Musalmán State, and by the Sirsa district of British territory; on the east by the Hissar district and Jaipur; on the south by Jodhpur; and on the west by Jesálmer.

The general aspect of Bikanir is dreary and desolate in the extreme, and Elphinstone has said that within ten yards of the capital the country is as waste as the wildest parts of Arabia. Speaking roughly, the west and part of the north of the country, which are comprised in the Indian Desert, are the least inhabited parts, and here the villages lie far apart. To the north-east and east, as far as Sujágarh on the south-east border, the villages lie nearer together, and there is more cultivation. Nearly the whole surface of the country is covered with undulating sand-hills from 20 to over 100 feet high, which in some places bear a scanty growth of harsh juiceless grass, of mimosas, caper shrubs and phog, a shrub with light and tender stem and branches, serving as fodder for camels. The consistence of these sand-hills is frequently so loose that men and animals stepping off the beaten tracks sink as if in snow. Except near the triple border of Bikanir, Jaipur, and Marwar, there are no rocky hills in the State, and the few there are, do not attain a higher elevation than 600 feet. Forest does not exist. South of the capital there is a considerable tract covered with brushwood, in which the horses and cattle of the chief are allowed to range, and near some of the towns there are small plantations of *bair* (*Zizyphus jujuba*). The commonest tree in the country is the *khejra* (*Acacia leucophlæa*), the pods, bark, and leaves of which are eaten by cattle, and, in times of famine, by the poor. During and just after the rains, the country, however, wears a very different appearance, becoming a vast green pasture-land, covered with the richest and most succulent grasses. The soil of Bikanir is everywhere sandy. In some parts—as at Bikanir itself, towards Delhi,

* This Gazetteer is mainly arranged and condensed from an account of the State written by Major P. W. Powlett.

and to the south-west towards the Jesálmer border—the sandstone substratum crops up.

Minerals.—Lime is abundant in many parts of the State, notably in the neighbourhood of Bikanir and Sujágarh. Excellent red sandstone is quarried at Khári, and the same stone is found in smaller quantities west of Bikanir. The Khári quarries supply ornamental building materials for all works of importance in and about the city. A rougher kind of stone is used for ordinary work. *Multáni matti*, a well-known greasy clay used by natives as soap and for dyeing cloths, is extensively quarried. Copper has been found in a hill near Bídásar, but it has never paid to work the mine.

The city of Bikanir is built upon a rock formation running south-west to north-east, which is many miles in length and four in breadth. It is considerably higher than the surrounding heavy sand-tract, and is composed of sandstone. Dr. Moore, in one of his reports, remarks as follows:—"The geological characteristics, and the water, may be considered together. Water at Bikanir is only obtainable three or four hundred feet from the surface. I investigated the material brought up from a well where water had first been obtained at the depth of 316 feet. This well was within the city-walls at the south-west extremity. The strata passed through were, first, a mass of *kankar*; then, a mass of *Multáni matti*, or red clay; thirdly, sandstone; and, lastly, white gritty sand or gravel, the latter consisting of white stones from the size of a pea to that of an egg, composed of quartz, and although not round, yet with surfaces and angles so smooth as to give rise to the idea that they must at some time have been exposed to the action of running-water. Carter, the geologist, has, I believe, expressed the opinion that the whole of this semi-desert portion of Western India did at some time form the bed of an ocean extending from the present shores of the sea to the line of the Arvali range; and the geological characteristics shown to exist by the deep wells of Bikanir would seem to support this opinion. On this point I may also observe that I found an unmistakeable fossil-shell mark on a stone of the wall of the old fort built by Bikaji. Although no companion marks were seen in other stones examined, yet a more minute and scientific search than I could afford would probably prove successful."

Climate and Rainfall.—Bikanir suffers from the extremes of heat and cold. During the summer the heat is exceedingly great, heavy sandstorms are of frequent occurrence, and the sun is so powerful that even the natives of the country fear to travel in the middle of the day: many lose their lives from sunstroke. The

hot winds blow with great fury during the months of May, June, and part of July. The rains generally commence in June, but are often delayed till the end of July, and the falls are usually at long intervals. The average rainfall for the three years preceding 1875 was ten inches. In winter severe cold is experienced, and trees and vegetation are destroyed by the frost.

Famines are not uncommon. As regards the diseases of Bikanir, notwithstanding all that has been said to the contrary, Bikanir may be regarded as, for natives at least, a more than ordinarily healthy locality. This has been generally attributed to free perflation of pure air and to good water. Doubtless to natives of some other parts of India the dry climate of Bikanir, and to the European the frightful intensity of the hot weather, would render the climate extremely trying. Medical returns for the years 1871, 1872, and 1873 show a smaller ratio of malarious fevers than in many other places, and although both intermittent and remittent fevers are common enough, the type does not appear usually severe, and spleen complications are not markedly prevalent. The fact, however, of these so-called malarious diseases prevailing at all in such a locality as Bikanir, where there is neither living jungle nor dead vegetation, where the rainfall is so small, and water so far from the surface, must be perhaps accepted as an additional argument to the many now advanced, that some other conditions than those conveyed by the term "malarious" are requisite for the production of paroxysmal maladies. Again, guinea-worm is, during some years, very prevalent, both at Bikanir and in neighbouring villages, where the water is even further from the surface,—facts not altogether affording confirmatory evidence of those opinions that the ova of the guinea-worm inhabit the slimy mud on the steps of wells.

Rivers, Lakes, and Wells.—There are no streams whatever. In the rainy season a *nulla* sometimes flows from Shekhawati over the eastern border, but is soon lost in the sands. The Ghaggar—also called the Sotra or Hakrá—once flowed through the northern part of the present Bikanir territory; but it is now dry, except occasionally in the rains, when it receives an influx of water which greatly benefits adjacent lands.

There are two fresh-water lakelets formed by the drainage from the rocky country south-west of Bikanir. Both lie on the route from Bikanir to Jesalmer.

The first, Gajner, about 20 miles from the capital, is perhaps the only pretty spot in the province. Its clear water and wooded margin, its palace and garden, and fields, are a pleasing contrast to the surrounding wilds.

Twelve miles further on towards Jesalmer the traveller meets

another small lake. This is a sacred spot, and numerous bathing-gháts have been built on the banks.

The lake of Chápar in the Sujángarh district is the principal source of salt in Bikanir; it is about 6 miles long by 2 broad, but very shallow, and almost dried up before the summer begins. About 40 miles north-east of Bikanir there is another salt lake. The salt produced from both lakes is of an inferior quality; it is only eaten by the poor, and used for curing skins. The yield of salt at Chápar is about 1,000 maunds annually.

Water is found, notwithstanding the slight apparent difference in the level of the country, at very varying depths, and by no means of equal quality. The city wells are more than 300 feet deep, and contain excellent water, whereas in some places water of inferior quality is obtained at 20 feet from the surface. Along the Jaipur border the water is very good; but for the most part a newly-dug well produces bad water, sometimes of so poisonous a nature as to cause irritation of the intestines and subsequent death to cattle that drink it. Rain-water is much used by the villagers, who collect it in covered pits (*kund*) or simple excavations (*sar*), where the ground is hard. At Nokha, about half-way between Bikanir and Ná Gore, is a well 400 feet deep and only $3\frac{1}{2}$ feet in diameter at the mouth; water drawn from this well is quite hot. No one seems to have any clear idea when the well was made, and no one knows why that particular spot was fixed upon for sinking a well. In other places, the one village well is generally in a hollow or depression between the sand-hills, where it would be reasonable to expect water near the surface. But Nokha is on a flat site, rather elevated above the surrounding country, the ground hard, and not at all the locality where water would be sought for at that depth with the confident expectation of reward for the labour. It is stated no one attempts to sink such wells now, probably because the number existing proves sufficient for the wants of the inhabitants, and not, as it would appear, from absence of workmen.

History.—Bika, the founder of the Bikanir State, was the sixth son of Jodha Rao, who founded the city of Jodhpur, and belonged to the Rathor tribe of Rájputs. He was born in 1430. Being of an ambitious and enterprising nature, he planned and executed an expedition into the country now known as Bikanir, which was then occupied by various tribes of Jits and others. The quarrels among them facilitated the conquest of the country; and of the two leading Jit clans, one made formal submission to the Rathors, the other was broken up or driven out.

The city of Bikanir was founded in 1488, and much additional territory wrested by degrees from the Bhatis, a rival Rájput clan.

Bika died in 1505: his successors gradually extended and consolidated their possessions, until in the middle of the sixteenth century the powerful Maldeo of Jodhpur annexed some of their lands to his territory. Early in the seventeenth century, however, Rai Singh of Bikanir entered into substantial political connection with the Delhi Empire, he and the Emperor Akbár having married sisters. Rai Singh gave his own daughter to Prince Salím, and served with distinction in the imperial armies in several parts of India. His son, Dulput Singh, also held rank in the army of Jehangir. This connection with Delhi, which was maintained for more than a century, much strengthened the chieftainship; the chiefs regularly took service with the imperial armies, and gained lands by grants of the emperors. Throughout the eighteenth century there was constant fighting between Bikanir and Jodhpur, and much land was alternately lost and won. At the end of the last century, Bikanir was governed by an able but unscrupulous chief, Súrat Singh, who was deep in all the intrigues and feuds of the period. He seized Bhatner, a place which had long been disputed, and annexed it finally to his State; afterwards he was himself besieged in his capital by the Jodhpur forces, but managed to arrange terms. His extortions and cruelties exhausted the country; his attempts to despoil and depress the Thákurs led to a chronic revolt; Amír Khan with his Pindáris entered the State, and helped the malcontents; so in 1817 Súrat Singh applied for assistance to the British Government. He had before applied for help in 1801, when his territories were invaded by a force from Jodhpur and other States, but interference on the part of Government was contrary to the policy which then prevailed. In 1818, however, Bikanir was allowed to enter into the general scheme of alliances formed at the beginning of the Pindári war. The chief was bound to subordinate co-operation, and the British Government engaged to protect his territories and to assist his endeavours to restore order by bringing under control the powerful clansmen who had revolted against his authority. A British force entered the State and reduced twelve forts, which were made over to the Darbár. No tribute was stipulated, as the Bikanir State had paid none to the Marathas. Súrat Singh died in 1828, and was succeeded by his son, Ratan Singh, who, in 1829, in violation of his treaty engagement, invaded Jesálmer. Jesálmer prepared an army to repel the attack, and both sides applied to the neighbouring States for aid. At this juncture the British Government interfered, and through the arbitration of the Maharana of Udaipur, the dispute was settled, both parties making reparation. From that time to 1857, Bikanir politics have been unimportant. In 1830 the chief again

found some of his principal nobles troublesome, and applied for British aid to reduce them, which could not be given. About 1849 the borders of the State towards Baháwalpur and the Punjab were at last fixed. In 1844 the Bikanir State agreed to a scale of duties on goods in transit through the country. The transit trade of Bikanir was once considerable, as it was the chief route from Kabul to India, and one of the main advantages secured by the treaty of 1818 was the protection of trade by that route. It cannot be said, however, that during this time of quiet the land flourished. There had been several years of famine, while the central administration remained weak. Sirdár Singh succeeded in 1852 to a load of debt, and to the business of constant striving against refractory Thákurs. He did good service during the Mutinies by sheltering European fugitives, and co-operating against the rebels in Hási and Hissar. As a reward for these services and his fidelity, he received a grant of forty-one villages in the Sirsa district. In 1868 the Thákurs had risen against his administration, and were giving much trouble by their turbulence, until their quarrels were at last arranged by British mediation. Sirdár Singh died in May 1872, and was succeeded by Dungar Singh, the present ruler, who was adopted by the widow.

The chief of Bikanir has received the right of adoption, and is entitled to a salute of 17 guns.

Form of Government and Dominant Classes.—The State is by constitution tribal,—that is, its territory is originally the dominion of a clan, or the sept of a clan, and its hereditary chief or governor is the representative of the oldest family in the clan, and of the most direct line from the founder of the dominion. This clan is the Ráthor division of the Rajputs, to which belong all the most powerful Thákurs, mostly kinsmen of the chief, who hold great estates under him, and who, though generally subordinate to the chief of the State, are very independent within their own territorial jurisdictions.

The present chief conducts the administration of the State through a Council under the presidency of his father and four members. The three principal courts under the Council are—

The revenue court.

The criminal court.

The civil court.

Each is under the control of a superior official, who is subordinate to the Council. All cases of importance are submitted for the orders of the Mahárájá.

The Thákurs of Bikanir, who represent the dominion of the clan, and are thus the frame-work of the State's constitution, are divided into seven classes—

1. Those descended from Bika.
2. Descendants of Bidá, brother of Bika, known as Bidáwats.
3. Those from Karmsi, Bika's brother, called Karmsiots.
4. Kándhalots, from Bika's uncle, Kandhal.
5. Mandhláwats and Rupáwats, from Mandhal and Rupji, two other uncles of Bika.
6. The Bhátis belonging to a separate clan, who possessed estates before Bika's conquest.
7. Miscellaneous Rájpút families of various clans, twenty-three in all. These are all *tázími*, i.e., they have an acknowledged rank among the aristocracy of the country, and a place of honour at all public receptions or ceremonies.

The first five classes, which were the most powerful, are all founder's kin; that is, they are branches of the stock of the original leader of the invasion which founded the dominion. When intercourse between the British Government and Bikanir was first established, there were three Thákurs with very large estates—Mahájan, Báhdarán, and Chúru. Besides these three, there were, and are, no Thákurs with more than thirty villages, and but a few who hold more than a dozen. The chief who set himself deliberately to work to break down the power of his great kinsmen was Súrat Singh, who succeeded in his object, though only with the aid of the British Government, in 1818, and by the establishment of the Shekhawati battalion (to which the Bikanir chief contributed) for the suppression of disorders. The once powerful Thákurs of Chúru and Báhdarán now hold only three or four villages, and at present the landed kinsmen, though they still preserve a great love of turbulent independence, could offer no serious resistance to an energetic ruler. Nevertheless, the frame-work of the clan dominion, the tenure of lands and rank by right of descent and by founder's kin, still holds together, so as to present an excellent specimen of this primitive style of political fabrics. All the land of the territory that is not held direct of the State upon cultivating lease, still belongs to the Rájpúts, whose aggregate freehold possessions are much larger than the area under fiscal management. The Thákurs now furnish no troops, their services having been commuted for a money rate, levied upon a system that will be described under "Land Tenures."

Agriculture.—Principal crops.—The staple crops are bájrā (*Holcus spicatus*) and môť (*Phaseolus aconitifolius*), and the bájrā of the sandy tract is said to be especially good, particularly in certain localities. Comparatively little of anything else is raised in the State, except when the rainfall is particularly abundant. In such seasons, fair crops of barley and wheat, and garden vegetables, are produced in about a dozen villages

west of Bikanir, in the northern and eastern districts, and about Sujángarh. Radishes thrive tolerably well, and carrots, onions, and tobacco are grown in a few places. Some of the cucurbitaceous plants succeed well, especially the water-melon, which grows to a large size.

About 25 acres of land can be ploughed each season by a good pair of bullocks. In many places, camels, buffaloes, and even donkeys are used for ploughing. A fair crop of *bājra* yields about five British maunds to the acre. The quality of the cultivated soil varies but little. Domestic animals are generally very fine and serviceable. The sheep about Bikanir are said to be the largest in India. The Bikanir camels are celebrated for their breeding and power of endurance; and, owing to the good pasturage and congenial climate, the cattle are of an excellent description. A pair of good bullocks for the plough cost about Rs. 40. Goats are kept in large numbers. Horses are bred by all the Thákurs, and some are sent for sale to the Pokhar Fair.

It is difficult to obtain information as to the area under cultivation, but it is unquestionably very small compared to the waste-land.

Locusts are often a great scourge. The year after that of the great famine, crops were extensively destroyed by them. When rains are excessively heavy, the seed sown in the light sand is washed away, and scarcity follows. Want of rain is the great cause of famine, and crops fail locally from this cause once in every four years. Such a wide-reaching calamity as the famine of 1868-69 seldom occurs, but, when it does, forms a terrible epoch in the village annals.

The yearly revenues of the Bikanir State amount to about Rs. 10,50,000, and are collected under the following heads, *viz.*, land-tax, customs, civil court fees, and certain miscellaneous items, as will be seen by the following table:—

	Rs.	A.	P.
Land-revenue	4,85,397	4	0
Custom-dues	2,61,107	7	0
Fines	50,275	7	3
Civil court fees	25,898	5	9
Other sources, <i>viz.</i> , sale of land, un- claimed property, mint, and adoption fees	2,31,975	13	6
Total	10,58,554	5	6*

The district towns and parganas are under separate *l. H. Ind.* or collectors of revenue, who exercise magisterial powers, and are

* All these figures are to be taken as at 1880-81.

of the tenure of their appointment depends. On their removal, they are invariably heavily fined, with the view of compelling them to disgorge part of their ill-gotten gains. Having submitted to fine, they are eligible for re-appointment to office.

Revenues.—The revenues of the State are collected under the following heads: land-tax, nazarána, customs, faujdari, court-fees, and other miscellaneous items.

Land Revenue.—The State is divided into *chíras* and *khálsa* *as* *vikánas*. *Chíras* are sub-divisions containing “*patta*” and “*betalab*” (revenue-free villages) only. “*Patta*” villages are mostly held by *Thákurs*, and subject to the payment of “*rakm*” (money rating), in lieu of the military service formerly required of them. “*Betalab*” villages are revenue-free grants assigned as *madad muásh*, or means of support to members and relations of the *Mahárájá*’s family, endowment set apart for religious and charitable purposes, and remuneration for service.

“Former mode of collecting revenue in *chíra* villages.—The mode of collecting the revenue in the detached *chíras* was as follows:—At harvest-time, a havildar (collector) with a “dera” (party), which generally consists of 20 to 30 men and 10 to 15 camels, was appointed to each *chíra* for the sole purpose of collecting the revenue. Additional deras on a smaller scale, but similarly constituted, were sent over the country for the collection of extra taxes. These deras were a perfect scourge to the country. The collections were made on no fixed principles of assessment, such as the havildar annually settled the amount of the demands with the bhogtás, or headmen, at his own discretion. The demands were paid to the uttermost farthing, from Rs. 20 to Rs. 150 per village, and at each till they amounted up to Rs. 500, which form the largest burdening the country, the dera expenses were as high as 37 per cent. on the revenue collection. On the completion of the year the havildar returned to the capital, leaving a portion of the remainder of the year to their own resources; consequently no official to whom they could apply for redress of grievances. The dera, while the *chíras* for the revenue, but the havildar generally took look for protection and presence in the village to settle employed in the *chíra* to the collection of

These rates are supplemented by irregular additions when good harvests enable the villagers to pay more.

The total number of villages in the province is about 1,800. Of this number, 368 are khálsa, in which the cultivators pay rent to the State officials, 384 are revenue-free, and the remainder are held by Thákurs, and are called pattas (see "Land Revenue").

The terms on which the Thákurs hold their pattas or estates are these:—They are bound to render personal service to the Mahárájá in the field with a fixed number of horsemen properly equipped, and armed with sword, shield, spear, bow and arrow, and matchlock. They are required to keep their pattas "úbad," that is, in a flourishing state, and not to oppress or overtax their ryots, and are not to harbour or take part with the chief's enemies. There are two classes of pattidars—(1st) those who pay revenue, and (2nd) those who do not. The holders of the latter are called "betalab" pattas,—under which head are (1st) the Rájwis (Mahárájá's near relations); (2nd) Pursungis (the chief's marriage connections); and (3rd) those Thákurs whose pattas having been attached or confiscated, hold villages or receive a fixed allowance for their maintenance. The holders of betalab pattas or villages are expected to attend their chief in the field and when he leaves Bikanir territory; but they and their followers are, on such occasions, maintained at the expense of the State. The Thákurs are bound to serve their own chief only. The word "rekh" literally implies a horseman properly equipped and armed for field service; Mahárájá Gaj Singh commuted the service by horsemen to cash payments at the rate of Rs. 60 per horseman (rekh). This sum was subsequently raised to Rs. 125, and increased from time to time by the addition of certain taxes, until at last most of the principal Thákurs formed a combination to resist the extortions of the Darbár, which led to British mediation, when it was arranged that the Darbár should grant the Thákurs a ten years' settlement, during which time they were to pay revenue at the rate of Rs. 200 per rekhs or horseman. This arrangement took effect in the year 1868-69; it was accepted by a few of the principal Thákurs at the time, and by several others after the death of Mahárájá Sirdár Singh. The rekhs of those Thákurs who do not come under this settlement are unfixed: the Darbár collects from them at the rate of from Rs. 200 to Rs. 400 per rekhs. The Taízimí or principal Thákurs, in addition to their rekhs, are required to pay (1st) "Húkumnama," or succession fee; (2nd) a certain sum occasionally collected towards the repair of the fort and city-walls; (3rd) camel-hire when the chief leaves Bikanir territory; (4th) a tax levied to meet the expenses of the chief's

marriage; (5th) a sum of money presented to the chief on his accession to the gadi; (6th) donation on the birth of the heir to the gadi.

The non-Taízimí, or Thákurs of a lower rank, in addition to the above, pay the following cesses, which are collected from their unfortunate ryots—(1st) “Rukhivali,” or protection fee; (2nd) “Dhuan,” or hearth-tax per family; (3rd) “Kurar* Jhunkera,” a sum of money paid in lieu of fodder, milk, curds, &c., supplied yearly to the Ráj; (4th) “Talibáb,” a cess levied from non-agriculturists; (5th) “Senghati,” a tax on sheep and goats; (6th) Chandurbáb, a tax levied on chowdries or lambardárs.

The Thákurs still furnish the chief with troops when he leaves his State, and would be required to do so in case of war. The Rájput owners of one or more villages are called “jágírdárs;” those in possession of land only are styled Bhúmias (from the Sanskrit word bhúm, which means land). There are two classes of Bhúmias—(1st) Rájputs who hold land as rewards for service rendered to the State; (2nd) the descendants of jágírdárs to whom land is assigned for maintenance. Bhúmias do not pay revenue to the Darbár, but they are subject to certain taxes which, however, are not always exacted. There is much bhúm land in Bikanir.

Commerce.—The imports are principally—

1st.—Jaipur cotton cloth, coloured and printed dhotis, chiefly prepared from English cotton piece-goods, coloured and printed at Sanganir, a town 8 miles to the south of Jaipur, famous for the design and durability of these prints, which are much appreciated by the higher classes in Rájputáná. Some of the chintz in gold and silver colours are extensively used in making wadded winter coats.

2nd.—Paper of a superior description, also manufactured at Sanganir, largely used in native courts and mercantile firms.

3rd.—Cotton.

4th.—Iron.

5th.—Cooking utensils of brass, copper, and bell-metal.

6th.—“Ruths” and carts made at Singháná, a town in Jaipur famous for the manufacture of these vehicles.

From Jaipur come bullion, gold, and enamelled ornaments, also tobacco and shoes. Opium, dyes, and cotton cloths come from Kota and from Marwar; from Ajmer come miscellaneous goods of all kinds. Grain is chiefly imported from the Punjab marts.

Exports.—The principal articles of export are—

1st.—Sugarcandy made of sugar brought from Málhárájanj, Shahjahanpur, and Shimli, in the North-Western

* “Kurar” means a bundle of the grain called mól.

Provinces. The best sugarcandy is produced from Máhárájanj sugar, and is celebrated for its purity, whiteness, and hardness, in which qualities it is not to be excelled at Bikanir.

2nd.—Wool (white and black), the produce of a superior breed of sheep, resembling those found in Afghanistan. The country in most parts of Bikanir is well adapted for the breeding of sheep, and the other trade in wool is capable of expansion, and would greatly increase the revenues of the country if it were encouraged and protected by the native authorities. The best quality of Bikanir wool is said to equal that obtained in the cold and hilly regions of the Punjab, but it is not so soft, nor do the natives understand the art of sorting and cleaning it. It is chiefly exported to Fazilka, where it is purchased by traders for exportation to Bombay.

3rd.—Woollen fabrics, blankets (called *loees* and *lonkar*). The loees are of a superior kind; the texture of the best is nearly as fine as the Kashmir loee, the difference between the two being that the former is not so soft, and is made of two separate sheets locked together, whereas the latter consists of one piece.

The manufacture of loees according to the Kashmir fashion has recently been successfully introduced into the Bikanir jail. The loee is exported in all directions; the winter clothing of some of the British irregular corps are made of it. The prices at Bikanir vary from Rs. 3 to Rs. 40 per piece. Lonkars are blankets, dyed red or crimson, about 3 yards by $1\frac{1}{2}$, and vary in price from Rs. 1-4 to Rs. 3 each, and are used by both sexes. Woollen cloth, made of black and red wool, is generally used for petticoats by the agricultural classes, camel-trapping, and chuts (large grain-bags made of goats' hair).

Ghee (clarified butter), produced mostly in the northern districts, is exported to a limited extent.

Ivory bracelets tinted with gold are made at Bikanir, and are in great demand in Rájpútáná.

Raw hides, and choguls (leather water-bags) made at Reni, are exported in great numbers.

Taxes on Trade.—The taxes on trade are as follows:—

“Ráhdári” is a tax on duty levied at the gates of the city on merchandise brought into the city; it varies from two rupees to nine pies per cart or camel load; the income derived from it is allotted for the payment of the guards stationed at the city-gates.

“Rúpátá,” a tax levied on shops, and on the sale of camels and certain goods in the city.

“Afím-ka-souda,” or license-tax on speculations in the prices of opium; it is levied on each speculator, and varies from two rupees to six rupees.

“Meúh-ka-souda,” a license-tax on speculation on the probability of rainfall. The two last named “soudas” are farmed to contractors, who collect fees from those who engage in such speculations.

There are also taxes on weighment and brokerance. And there is a license-tax on craftsmen, such as goldsmiths, blacksmiths, ironmongers, tailors, shoemakers, &c. The amount is levied yearly through the chowdries or headmen of each party; no register showing the name or number of the persons taxed is kept; a certain lump sum is paid by the chowdries. The proceeds of the taxes levied on certain trades are permanently placed at the disposal of the Public Works Department, whose own officers impose and collect them.

Population and Social Sub-divisions.—According to the State returns, the number of the population is about 300,000, of whom about 260,000 are set down as agricultural; of houses about 58,000, and of villages about 1,800. These figures must be regarded as only approximately correct. The most numerous castes are Játs, who are more than twice as numerous as any other class, banyas and Rájpúts of various degree, from the proud Thákur to the humble cultivator. The Játs are all agriculturists. Three-fourths of the Rájpúts and many of the banyas and Bráhmans also cultivate the soil.

The numbers of the principal divisions of the people are thus estimated:—

Játs (about)	...	...	...	50,000
Banyas	...	...	...	30,000
Rájpúts	...	...	...	12,000
Bráhmans	...	...	...	20,000

Caste, Clans, and Tribes.—A list of the different classes of Rájpúts has been given.

The Játs, who are the most numerous caste, were in ancient times the possessors of the greater portion of the Bikanir territory. They are the agriculturists of the country, and more severely taxed than any other class. Many of them are Bishnawís, and abstain from the taking of life. They are civil, good-humored, and obliging, and, notwithstanding the weight of the taxation laid upon them, are attached to the ruler of the land and proud of his notice.

The headmen of the Ját sub-clan of Godará has the right of placing the tilak, or mark of inauguration, on the forehead of every chief when he ascends the throne. This practice has prevailed since the foundation of the present dynasty.

The Bishnawí Játs bury their dead.

Banyas of the Maheśrī, Oswál, and Agarwálá castes form the bulk of the trading community, and the two former are the richer and more influential. The latter trade a good deal locally in English imported goods, while the Maheśrís and Oswálís are opium-traders, contractors, bankers, &c., and their business generally is far from home.

Rájpúts of many clans are to be found in Bikanir, and form the aristocracy of the land. Bika, Kándhlot Bidawat, Rathor, and other classes, Bháti, Kachhwáha, and Ponwár, are the main divisions.

According to employment, the Rajputs may be divided into—

1. Those who hold estates.
2. Those in service.
3. Those who till the soil.

The first class comprises the old hereditary aristocracy of the State; the second is employed by the nobles and at Court; and the third, which is the most numerous, is treated with some favour.

Bráhmans are divided into Pokarna and Paliwál. They are traders and agriculturists, and generally a hard-working class.

Chamárs are the only remaining numerous class. Of Musalmáns there are but comparatively few. A clan of Pírádas, or descendants of a Musalmán saint, claim to be lords of the region between Anúpgarh, Púgal, and Marot. And there are some Sayids settled in the country since the days of Aurangzeb. There are also Bhátis and Rahts, both clans of Rájpúts converted to Islam.

The official class consists of hereditary servants of the State, and foreigners. Against the latter there is a strong prejudice throughout the country. Many important families of hereditary servants are descended from the officials who accompanied Bika when he left Jodhpur to invade Bikanir; these are called mutasadis; other mutasadis are descendants of men introduced long ago by chiefs other than Bika.

The menials are hereditary household slaves called "chelas." They are never sold by Rájpút families of distinction, though they often form part of a bride's dowry. When not the children of slaves, they have usually been purchased in times of famine from their starving relations. Their work is light, and they are generally well treated, and sometimes placed in positions of high trust; but some Thákurs occasionally act with much cruelty towards those in their service. The term "chela" signifies disciple rather than slave.

The priests of the Darbár are generally Kanauji Bráhmans of the Sanor division. The ancestors of the present priests are said

to have accompanied Seoji when he emigrated to the desert from Kanauj. Pándits or teachers, and the astrologers, are Bráhmans.

There are about ten official chárans, or bards who compose historical verses and write books.

Religion and state of Society.—No statistics of the respective numbers of Hindus, Musalmáns, and Jains in the province are procurable. Among the Hindus, the Jains are very strong, and a great many merchants belong to the Oswal division of that sect. Many of the commercial classes belong to the Mahesrí and Agarwálá castes, and Valabhacharya votaries of Krishna are numerous. The general character of Hinduism is here the same as elsewhere, though a few of the peculiar beliefs and worship may be mentioned. Perhaps the most curious religious sect in the State is that of the Alakgirs, founded by a Chamár named Lalgir. He denounced idolatry, and taught his followers to call only on the Incomprehensible (Alak), and his sole worship consisted in crying "Alak ! Alak !" Charity was to be practised ; the taking of life, and meat as food, was forbidden ; and a sceticism encouraged. The sole rewards he held out to his followers in this life were the attainment of purity, untroubled contemplation, and serenity. There was no future state ; heaven and hell (that is, happiness and misery) were within. All perishes with the body, which is finally dissolved into the elements ; and man has no immortality.

The worship of Karniji, the Cháran woman whose supernatural power secured the country to Bika and his descendants, is prevalent, and hers is the chief shrine in Bikanir. Lakshmi is adored with scarcely less devotion, and the temple of Devi near the city is much frequented. The image it contains was brought from Jodhpur several hundred years ago.

Local deities and shrines are numerous, and exercise much influence on the devotees and dwellers in their neighbourhood. The juj ars, or heroes who have fallen in defence of their village, have been canonised, and their memory is cherished by adoration at their shrine.

Although the political power of the Thákurs has greatly passed away, they retain much of their turbulent vigour, which is often expended in dacoity and cattle-lifting. Every one who has the means possesses a small fort, which is surrounded by a rampart of sand, supported by twigs of the phog shrub. When a robbery at some distant point is contemplated, the Thákur prepares his horses, for the exertions they will have to undergo, by a daily allowance of ghee, and, when all is ready, he, banded with some of his active neighbours, makes a long night journey, often guided by the stars alone, to the appointed spot. Here, till the arrival of the victims, the party lie hidden near a mound or thorny

hedge. The booty, which usually consists of camels and their burdens, including perhaps the wife of a rich banya, is then hurried off without delay in a direction likely to baffle pursuit, for a skilful tracker will soon be on their trail. Sometimes they take considerable trouble to obliterate their tracks; but this is no easy matter, for the skill of the trackers is marvellous; though thrown out for a time, they will recover the trail. But the wind and drifting sand aid the freebooter, who usually gets off with his prize. If the offence is brought home to him, he seldom suffers any penalty beyond having to restore the stolen goods. It must not be inferred that all Thákurs are unscrupulous as regards plundering. Some disapprove of it, and even an average Thákur often thinks it improper to plunder within the limits of his own State, unless the Darbár has ill-treated or expatriated him. His object then is to make himself as offensive as possible to the rulers. If active in dacoity, a good border Thákur is equally active in resisting it, and some of the more powerful ones add to their income by the tribute they receive from their weaker neighbours for protection from marauders. The Thákur of the desert is of convivial habits, and, when a feast is given, no one is fit for business till noon the next day. However poor, they have a horror of menial work. The wealthy classes in the State are the officials who have made money by speculation and extortion, and the merchants who trade in British territory. Few Thákurs are rich, in consequence of the heavy taxes imposed upon them. Though the regular pay of the revenue collectors is small, they make large sums by extortion, which is easily practised, owing to the size of the tracts committed to them, and the consequent difficulty of supervising their proceedings. The agricultural community, which comprises thirteen-fifteenths of the population, is miserably poor for the most part. The camels, kine, and sheep they possess are their great resource, but a precarious one, owing to the prevalence of famine, drought, and robbery. Though famines are frequent, and a general famine occurs at least once in ten years, the mass of the people, until very recently, possessed no stores of grain wherewith to meet them; and emigration, dependence on charity, or subsistence on grass seeds, are the only resources of the population when a severe dearth sets in.

Bájrā cakes, môt, and porridge made with buttermilk and bájrā flour, form the staple food of all but the well-to-do, and even they often prefer bájrā to wheat flour. Játs who are large cattle-owners consume much ghee. Sugar is largely eaten at festivals.

Houses are of three kinds. Those well off live in masonry houses, the intermediate classes in houses built of mud, and the poor in huts made of phog roots and grass. These last

are round, and look like small ricks. Fences of thorn usually surround them, inside which cattle are kept. The shop-keepers are thriftier than the peasantry. Many of the traders gamble in opium time-bargains, and so interested are the speculators, that a special post is established between Ajmer and Bikanir that the earliest information of prices may be obtained.

Though the country would seem to possess few attractions, emigration or settlement in foreign towns is very rare among this class. At present, the wealth brought into the country by the merchants whose houses of business are in the great seats of commerce, is expended chiefly in entertaining Bráhmans and their caste-fellows, or is hoarded in the shape of jewels and ornaments. Except by the officials, little money is made within Bikanir.

The principal manufactures are those of blankets and sweet-meats; the latter are made from sugar that is brought into the country, and large quantities are exported. Rain-water is used for refining the celebrated Bikanir sugar. Ghcee, wool, and cattle are exported to a large extent. Wheat, rice, metal, piece-goods, the better kinds of pulses, and groceries are imported. Want of confidence in the Government prevents merchants and traders settling much in the State, and accounts largely for the non-occupation of waste-lands.

Administration : Judicial System.—The administration of justice has latterly been conducted on a more satisfactory plan. Instead of the time of the Council being taken up in deciding petty causes, the officers of the civil and criminal courts have been granted higher powers. The criminal officer is authorized to pass sentences of imprisonment not exceeding six months, and to impose fines of Rs. 100. The civil officer has the same powers, and can decide civil suits to the extent of Rs. 1,000. Serious cases may also be investigated by these courts, but they must be submitted to the Council for final orders. During the year 1873-74, the number of criminal cases instituted was 752, disposed 697, and pending 55. Imprisonment was awarded to 187 offenders, and fine inflicted on 137, the total amount of fine being Rs. 22,382. There were 15 cases of murder, 14 of dacoity, 105 of highway robbery, 115 of cattle-lifting, 105 of assault, and 107 of house-breaking. The following abstract shows the work done by the civil court during the same year:—

Cases instituted	...	...	...	394
„ disposed	...	...	...	300
„ pending	...	...	...	94
Amount of court fees	...	...	Rs.	5,019

The Mínas and Báoris, who are notorious for their predatory habits, have been subjected to many restrictions, which will probably have a salutary effect on their future behaviour.

Jails.—At the close of the year 1873-74 there were 88 prisoners in the Bikanir jails, 49 of whom were in those of the capital, and 39 of those in the districts. Four were in prison for life, one for ten years, and the remainder for various terms less than ten years. Some of the prisoners are employed in carpet manufacture, and others in road-making. The jails are clean, and the inmates are well and in good condition. Improvements in the jail system have only been effected recently, for formerly the arrangements were disgraceful. Low-caste prisoners used sometimes to be chained on the open plain without shelter of any kind.

Education.—A school, which contains 300 students in Persian and Hindí, has been recently established. Previously the only places of instruction were the temples, Jain monasteries, and “patshálas.” At these the sons of many of the wealthy merchants are taught to read, write, and cypher. Their whole school equipment is a board and a bit of wood, and their studies are usually conducted on a shady side of the street. They are not so well attended now as formerly, as boys are taken away at an early age to be introduced into business. A course of reading and accounts occupies about three years. At the Jain monasteries Sanskrit is studied. In one of them, Captain Powlett found the priest, who was courteous and communicative, and ready to permit access to his large Sanskrit library, teaching geography from a curious map (which showed the concentric oceans and continents enormously exaggerated in dimensions), and history to match. A copy of the map was sent to the Kensington Exhibition of 1871.

At the mosques the usual elementary schooling and learning by rote is given. In 1873-74, Dr. G. Bühler discovered many valuable works in Sanskrit in Bikanir, and one hundred and twenty manuscripts, referring chiefly to the Jain religion, were purchased for Government.

Communications.—There are no made roads in the country, with the exception of one extending for a mile or so from the capital. Carts can make their way, though the travelling on the sand tracks is heavy and laborious work. Goods are carried on camels. The principal routes are as follow:—

From Bikanir to Ajmer, about 150 miles—

Bikanir to Deshnuk, 16 miles; shops and good water at Deshnuk.

Deshnuk to Chakra, 20 miles; shops, good water.

Rest of journey through Jodhpur territory.

From Bikanir to Baháwalpur, about 150 miles—

Bikanir to Eadrasar, 15 miles; good water, but no shops.

Karnisar, 14 miles; water bad, no shops.

Púgal, 20 miles; water good, and shops (a line here branches off to Jesalmer).

Maujgarh in Baháwalpur territory, 60 miles; water and shops; intervening country waste.

From Bikanir to Bhiwani, 180 miles—

[The places are not marked on the map, and the distances are therefore not given in miles.]

Bikanir to Karnisal, 12 kos; water good, and shops.

Kalú, 12 kos; water good, and shops.

Bahadursar, 16 kos; water good, and shops.

Sardárgarh, 8 kos; water good, and shops.

Réni, 14 kos; water good, and shops.

Rájgarh, 14 kos; water good, and shops.

Khurdkot, 8 kos; water good, and shops.

From Bikanir to Sirsa, 160 miles—

Bikanir to Malhasar, 10 kos; water good, and shops.

Khari, 12 kos; water good, and shops.

Náthwána, 8 kos; water good, but no shops.

Sai, 14 kos; bad water, and no shops.

Shekhsar, 16 kos; good water, and shops.

Palu, 16 kos; good water, and shops.

Nohar, 18 kos; good water, and shops.

Jamálki, 10 kos, in British territory.

Fuel is procurable everywhere but on the Multan route; there, it is procurable at Púgal alone. The “kos” is slightly under two miles, and as, until the Bikanir topographical survey is finished, precision in distances is not always possible, it is preferable to employ the word “kos.”

Principal Towns.—The city of Bikanir was founded in A.D. 1488. It is situated on a desolate and slightly raised spot, the soil being hard and stony. From a distance, its walls and towers and battlements, and the loftier houses and temples rising above them, have a most imposing effect. This illusion, however, is dispelled when the interior of the city is reached, which may be described as a labyrinth of crooked alleys. The walls are $3\frac{1}{2}$ miles in circumference, varying from 15 to 30 feet in height. They are built entirely of stone, and pierced with five gates and three sally-ports. On three sides there is a ditch, but the ground to the south side is sufficiently protected by a network of deep ravines. As the soil is calcareous conglomerate studded with siliceous pebbles, the sides of the moat are nearly perpendicular, though not faced with masonry. Within the walls there are many good houses faced with red sandstone and richly carved, but, being situated in narrow, dirty lanes, produce little effect. A reddish clay is plastered over the poorer houses, which

gives them an appearance of neatness and uniformity. Each trade or craft is allotted an exclusive ward. The population of the city and suburbs has been estimated at about 35,700, and the most numerous classes are banyas and Bráhmans. Water is obtained chiefly from very deep wells, but also from tanks, of which there are four in the city and six in the outskirts. There are no remarkable public buildings in Bikanir city. The fort of Bikanir, which contains the Maharájá's palace, has an imposing appearance. It is surrounded by a ditch, and fortified with ramparts and bastions.

The old fort built by Bika, which is small, is picturesquely situated, outside the southern wall of the city, on some high rocky ground, encompassed by ravines.

Northern Districts.—Anúpgarh is the chief town of the district bearing the same name. It lies on the bank of the Sotra, and contains a strong fort. There are 37 villages in the Anúpgarh district.

Next among the northern parganas comes Sardágarh, lying to the eastward of Anúpgarh. Its chief town, Sardágarh, is also on the Sotra.

Eastwards of this, again, lies Súratgarh, containing 500 houses.

The Hanumágarh district contains 110 villages, and Bhatnár is its principal town. Tibi has 42 villages. Good crops of wheat are raised here, when heavy rainfall causes the Sotrâ to overflow its banks.

North-eastern Districts.—The north-eastern districts comprise, in the west, Nohar with 142 villages, and Báhádrân with 89 villages.

Eastern Districts.—Rájgarh, the chief town of the district of that name, contains 900 houses. The town of Réni contains 1,100 houses, and is said to have been founded by Rájá Réni Pál. There is a fort there.

In the Chúru district there are 2,442 houses, and its headquarters is of the same name. It has rather a pleasant appearance, as there are several good houses, and a few trees grow close to it. Several trade routes converge here.

South-eastern Districts.—At Sujágarh, the chief town of the Sujágarh district, which contains 210 villages, there is a fort, British post-office, and a house for the use of the British Political Officer. Most of the large villages in this district, in which Thákurs reside, have forts. The Chápar lake, which has been previously mentioned, produces annually an average of 25 tons of salt; but it is bitter, and of an inferior quality. There are two mosques and twenty-seven temples in the town. It was founded in A.D. 1835.

Ratangarh is a tolerably large place. The bazar and houses are good, and many of the inhabitants are affluent. The post office established here receives and despatches 200 letters a day. There are sixteen temples.

Púgal is a large fief in the west of the State.

Besides the capital, the chief towns are Chúru, Ratangarh, Sujángarh, each having a population of about 10,000. Next in order come Rájgarh, Réni, Nohar, Báhádrán, Deshnuk, Súgarh, and Koláth, with a population of about 2,000 each.

Fairs and Remarkable Places.—A fair takes place at Koláth every October, at which 60,000 people assemble. This is the principal fair of the State. Koláth is a place of pilgrimage, and there is a tank there with a number of bathing-gháts. There is a fair at Ramdesar on the 13th August, to which some 10,000 people flock, but there is little trading. At Devi Kund, Sahansarláo, Gaisur, Harsolái, Sujándesar, and at three of the temples in the city, fairs are annually held; also one at Dadrewa, in Rájgarh, on the 1st of August, in honour of a Musalmán saint. In January, February, March and September, the Mahárájá goes in state to visit the temples in the fort that are sacred to Devi; and in July worships at Devi Kund, where are the cenotaphs and mausoleums of his ancestors.

Bhatner Fort is of some historical interest, having at various times been captured by Mahmúd Ghaznavi, Taimur, and Kámur, the son of Humayún. It appears to have been granted to the Singh of Bikanir by the Emperor Akbár.

The town of Púgal is one of the oldest in these regions, and was one of the nine strongholds of Márú, when the Ponwars ruled in the desert. In 1830 the chief of Bikanir captured it, and reduced its Thákur to subjection. Réni, where Mahárájá Singh was born, is a place of some renown. There are a handsome Jain temple and some cenotaphs there. The temple was built in A.D. 942, and so solidly that the structure is now as strong as when first erected. Sálásur, on the Jaipur border, east of Sujángarh, has much repute for its shrine of Hanuman, and considerable numbers of pilgrims are attracted thither from distant parts on the full moons of Kártik and Baisákh. In the city of Bikanir there are seven Jain monasteries (upisaras) which possess numerous Sanskrit works, but none are striking in appearance. The Jain temple, also in the city, with its lofty dome, is conspicuous from a distance, and is elaborately carved. With the exception of the "Madan Mohan," the other temples are unadorned and ornamental.

Devi Kund (previously mentioned), the place of cremation of the Bikanir chiefs, is three miles east of the city. On the

side of the tank are ranged the sepulchres of twelve chiefs, Kalin Singh to Ratan Singh. Several of them are handsome structures, and all are domes supported by graceful pillars. They are built of red sandstone, and the commemorative stones are of marble. On these are sculptured in bass-relief the mounted figure of the chief, and on foot, standing in order of precedence before him, the wives, and, behind and below him, the concubines, who mounted his funeral pyre. Up to the time of Gaj Singh, the "satís" over each chief averaged above twelve. The last famous "satí" in Bikanir was that of Díp Kanwar, an Udaipur princess and wife of Mahárájá Súrat Singh, who met her death in 1825. People still speak of the courage and devotion her bearing showed as she wended her way with uncovered face to the fatal pile. A numerously attended fair is annually held in reverence to her memory at Devi Kund.

A curious instance of "satí" by a male occurred in 1789, when one Sangráam Singh perished in the flames with the corpse of Mahárájá Rái Singh.

Deshnuk, the famous shrine of the tutelary deity Karniji, has been mentioned in another place.

GAZETTEER OF BUNDI.*

General Topography.—The Rájput State of Búndi lies between north latitude $25^{\circ} 59' 52''$ and south latitude $24^{\circ} 59' 30''$. The extreme of its eastern longitude is $76^{\circ} 21' 35''$, and of its western $75^{\circ} 18' 6''$. Its area in square miles is 2,218, length about 85 miles, and breadth about 50 miles.

The territory of Búndi may be roughly described as an irregular rhombus lying between 25° and 26° north latitude, and $75^{\circ} 15'$ and $76^{\circ} 30'$ east longitude, having a total area of about 2,041 square miles. Its longest diagonal, from the south-west to the north-east corner, is about 71 miles. The shorter one, from the north-west to the south-east corner, is about 47 miles. It is bounded on the north by the States of Jaipur and Tonk; on the south and east by that of Kotah: the river Chambal forming for very nearly the whole distance a natural boundary between these two States; and on the west by Mewar. The State is traversed throughout its whole length from south-west to north-east by a double range of hills, constituting the central Búndi range, and dividing the country into two almost equal portions. At first a single range of some breadth crowned by a rather considerable plateau, it becomes split up into two ridges near Sátor, which continue to run in a parallel direction, singularly regular through the remainder of their course to Judurgarh in the north-east. For many miles its precipitous scarp on the southern face forms an almost impassable barrier between the plains which it divides. In the centre of the range commanding the pass through which runs the high road from the south, toward Ajmer and Jaipur, lies the city of Búndi. The highest elevation of the scarp reaches 1,793 feet above the sea at a point about 5 miles south-west of the large village of Sátor. In the neighbourhood of Búndi itself, the average height above the sea is about 1,400 feet, and above the lowland below, 600 feet. Beside the Búndi pass, the only other passes through this ridge are one between Jainwás and Búndi, the entrance for the direct road from Tonk,

* This Gazetteer consists almost entirely of papers contributed by Captain W. Muir and Dr. DeFabeck, of the Rájputáná Agency.

and another between Rámgarh and Khatgarh, where the Mej river has cut a channel for itself from the northern into the southern Búndi basin. A prolongation of the sandstone ranges of western Kotah enters Búndi in the south-west, and forms along the whole extent of its western boundary a semi-lunar ridge, having its concavity to the east, and its horns almost due north and south. The southern one blends with the sandstone range of Kotah. The northern projects itself into a long low ridge of hills, of which the tract known as the Mína Kerár may be considered to be the origin; and which, with singularly undeviating direction to the east-north-east, loses itself in the Jaipur State.

In and about the central range the scenery is often very picturesque, but on either side of it the open country is for the most part flat and without marked features, though as the plains close in at their western extremity the landscape becomes more varied. In this respect the northern differs entirely from the southern basin; a difference which is mainly due to the peculiarities of the geological formation hereafter to be described.

The northern basin lies exclusively upon a bed of slate shale and clay slate, which is always very near the surface, and occasionally, as at Hindolí and Dugári, it rises into very picturesque groups of low but rugged hills. The soil, too, throughout most of this basin is stiff and unproductive. The southern basin, on the contrary, is rich in good cultivable alluvial soil, and where this becomes associated with the low sandstone ridges of south-western Búndi, some very picturesque contrasts are the result; the barren rocky ridges coming out in strong relief against the rich cultivation and profuse foliage of the lower lands. These same peculiarities of soil also give a totally opposite character to the river-beds of the two basins: thus, in the northern basin the streams have a much less devious course than in the southern; and while these have rocky beds and tolerably regular banks, the others wind through an intricate net-work of ravines formed in the more yielding soil.

Beyond the northern boundary of Búndi proper there are several outlying portions of territory belonging to this State. The largest is that of which Garh is the chief town. It is a very irregularly-shaped patch in the south of Jaipur, and adjoining, by its north-eastern border, the south-western one of Tonk. While it has a circumference of about 90 miles, its area is only between 50 to 60 miles.

There are three other such outlying portions of Búndi territory beyond its northern border, but they are all small, insignificant patches of soil, none of them exceeding 4 square miles in area. One, of which Sháotali is the chief village, is 8 miles west of

Nainwah : another, Thákoli, is 15 miles north of Nainwah : and the last and least, Deori, is 7 miles north-north-east of Nainwah.

Large tracts of Búndi are woodland, consisting chiefly of sál, tendú, khair, mulkarai, bábúl, mohwa, ber, and bel. The wood of the sál is brittle, and of little use except for fuel. A gum exudes from it which the Bhíls and others barter, weight for weight, against flour. A kind of incense is also sometimes made from it. The gum is procured by peeling off the thick bark, leaving only a thin shell. After thus leaving the tree for a few days a handful of gum may be obtained. The tendú is of stunted growth, and is seldom allowed to exceed 6 inches in diameter. It is much used for rafters, &c. Except in very old trees, ebony is not found. The fruit of the tendú is much relished. A splendid tree growing near streams is the mulkarai. It attains a great height, remaining perfectly straight throughout, with a diameter of from 12 to 15 inches. The wood is prettily grained, but is too brittle for timber. Neat furniture might be made of it.

The khair is a thorny tree used chiefly for ploughs, its wood being tough and strong. The forests are protected very fairly. Wood-cutters have to pay a tax of 8 annas a month per axe, but no more wood is allowed to be cut than is absolutely necessary.

Geology.—The central range, forming as it were the backbone of the Búndi territory, indicates sufficiently clearly the direction of strike of all the rock strata about this part of the country. The geology of the district is therefore most advantageously studied on a sectional line running in the directions of the dip, or almost at right-angles to that of the strike. This line may be drawn roughly in a south-easterly direction from the Rájmahal and Todah range of hills in the Jaipur territory, to somewhere near the city of Kotah.

The Todah hills are composed almost exclusively of gneiss, and present in a marked degree the features which that formation generally imparts to a landscape. It is through these hills that the Banás has cut its way; and although that river for only about two miles of its course flows through Búndi soil, it yet is a marked indication of the geological changes which have taken place in that territory, and, as has been already shown, becomes an important element in the consideration of the watershed of this part of the country.

Pursuing the line indicated above, the gneiss is found to be overlain by a thick bed of mica slate. An important outcrop of this rock is traced in a very long regular linear range of low and irregularly-shaped hills running nearly parallel to the great Búndi midrib from Jawál in Mewar, with unusually straight direction, into the Jaipur territory near Khákar.

Between this ridge (which is described in the topographical section as the Awán range) and the Rájmahal and Todah range, there is a shallow basin of transition rock, which has become overlain by an extensive plain of kankar, averaging about from 6 to 8 feet in thickness.

It is on this bed that the cantonment of Deoli stands.

Near that station the ridge is considerably broken, forming an irregular tract of low hills, chiefly composed of mica slate and transition schistose rock, sometimes containing garnets and actinolite, copiously veined with quartz. This is the tract known as the Mína Kerár.

Leaving, then, these hills near Tíkar, the Búndi territory is entered between that village and the village of Básni, about two miles beyond which latter village lies that of Umar.

Here a marked difference appears in the geological formation, and thence in the character of the scenery. The rock is rich in limestone of exceedingly compact and crystalline substance, admirably adapted for building purposes of all kinds.

Much of it is used in various parts of the Búndi territory, notably in the palace of the capital itself. It is all hard and of close-grained texture, easily susceptible of polish, but varies much in colour. Some is light-grey, occasionally veined with chlorite and felspar; some is dark-grey, streaked with striæ of yellow ironstone; some is reddish-grey; and some approaches the character of marble, very well suited for ornamental architectural work, but not sufficiently saccharoid in texture to render it applicable for statuary purposes. Most of these limestones are dolomitic, though both the white and light-grey varieties are burned for lime. Many of them are copiously striped with intercollary layers of the black oxide and carbonate of iron, and all of them are fossiliferous.

Associated with this formation are occasional deposits of ironstone, which were at one time worked much more extensively than they are now. There are still the remains of ancient quarries (they hardly deserve the name of mines), which gave work at one time, it is said, to no fewer than 700 families. Now there are not more than 11 houses in the village of Umar inhabited by iron-workers, and the old disused quarries have become yawning caves, often frequented by tigers, who find in the perennial stream flowing past the village, and in the wild brushwood jungle covering the surrounding hills, a pleasant retreat during the hotter and drier seasons of the year.

The ironstone is not found in veins, but lies very irregularly dispersed. The distribution of the metal, too, within the ore is very irregular, sometimes exhibiting an appearance of partial infiltration; sometimes the iron is more homogeneously diffused,

and sometimes it is deposited in drusic cavities in the form of crystallized carbonate of iron. Nor is it rich in ore, yielding probably not more than 15 to 20 per cent.; but it is of the kind called spathic iron, and is well adapted for the manufacture of steel. Yellow and brown ochre are found in connexion with it, sometimes in considerable quantities.

Occasionally extensive cavities occur filled with a friable chalky stone very nearly white, composed almost entirely of carbonate of lime with a trace of iron.

Iron of similar quality to that just described, and similarly associated, occurs in several parts of this ridge: but in the Búndi territory it is only worked at Umar and Pagará, a large village about four miles to the north-west of Umar.

The magnesian limestone bed in which it is found is probably only a partial deposit; for lying over it, immediately after leaving it at Umar, the usual transition from the lower mica slate to schistose clay slate is observed; this latter merging ultimately into actual clay slate, forming what has already been described as the great north Búndi slate-bed.

Between Umar and Hindol it is schistose, much reddened here and there by iron; but soon after leaving the latter village, it passes into pure slate, extending up to the foot of the main central range within which the capital is situated. The slate, as far as can be ascertained from superficial observation, appears to be variable in quality; but nowhere is it properly worked.

Near the small village of Bichri, where the Mej river has laid bare a more than usually compact stratum, slabs of slate of from 20 to 30 square feet in area are occasionally extracted, but there can be little doubt but that the labour of deep-quarrying would in many places be amply repaid by the result.

In colour the slate varies from bluish-grey to greenish and violet-grey. It is soft in consistence, hence easily worked, and much employed for open lattice-work windows and screens: it absorbs about one-fortieth of its own weight of water, hence it is unsuitable for exposed situations, and, being deficient in compactness, it can only be used in slates varying from half an inch to an inch or inch-and-a-quarter in thickness.

It is mainly to the softness of this extensive slate-bed that the Búndi territory owes its present physical features, as will hereafter be shown in treating of the manner in which telluric and atmospheric causes have operated to bring about this result.

In approaching the great central hill-range the slate becomes more schistose and ferruginous. Here and there veins of quartz associated with greenstone break through it, running in a parallel direction to all the other rock formations.

The central range itself is composed chiefly of limestone, varying much in quality, being sometimes crystalline, of fine compact grain, and grey in colour, as near Bárodiah, Náýagáon, Phúl-bágh, and Dalelpurah, in all which places it is quarried: sometimes loose and shaly, as near Taláogáon, where it is burned for lime (this locality being indeed the principal source from which lime used in the capital is drawn): sometimes brecciated and tufaceous intermixed with quartz and felspar in various stages of decomposition, ironstone, and occasionally porphyritic rock. Near Bárodiah, a band of decomposing quartz supplies one of the chief ingredients employed by the glass-workers of that village for making their beads.

The ironstone, as at Umar, does not occur in veins or strata, but is irregularly distributed. It is also similar in quality to the Umar stone, though somewhat richer in ore, and, like it, associated with yellow and brown ochre. In several localities along the range, mines have been established. At the quarry whence the ironstone for the Lohápurah works near Kidárnáth is obtained, bloodstone is found in quantity. On the southern slope of the great central range, the slate shale again appears, indicating that the extensive stratum of limestone rock and trap of which that range is composed, is an accidental deposit, and not to be classed in the same category with that which is found to underlie the slate at Umar. Nevertheless all these rocks are entirely fossiliferous, and therefore belong to an age immediately succeeding that of the earliest crystallizations of telluric elements into a solid crust.

With the re-appearance of the slate shale, we have slaty limestone forming the basis of the vast silurian stratum which extends through southern Búndi into Kotah, and as the boundary between these two States is approached, the sandstone of that system appears. This sandstone, like the limestone, exhibits no traces of organic remains. It is of fine close grain, light-grey, sometimes inclined to red, in colour, and occasionally occurs in such wonderfully unbroken beds, that could appliances for raising such masses be obtained, blocks of from 200 to 300 square feet in superficial area, and from 1 to 2 feet in thickness, might be extracted.

It is further to be remarked that while the dip of the northern strata indicates the occurrence of considerable displacement, these sandstone beds lie horizontally, and appear to have suffered little disturbance since their first deposition.

Hence the character of the scenery, although the rock is much exposed, is that of low gentle undulations, without any abrupt features, except where some rain-torrent has riven a chasm for

itself through the silicious rock. The channel of the Chambal above Kotah, and that of a tributary of the Sukh river, furnish notable instances.

Near Keshorai Pátan, the sandstone is traversed by a band of dark-red limestone, which, on exposure to the action of the atmosphere, exhibits undulations, indicating that solidification has taken place from points within the mass round which the remainder became gradually concreted.

Hard and of rich colour as this stone is, and well adapted for internal use, or for purposes for which a high polish is desirable, it is, on account of this quality, quite unsuitable for exposed situations.

Broadly, then, the soil of the Búndi State lies on a vast bed of slate, with the silurian sandstone above it, and the primary mica slate and gneiss below it, in regular geologic order. It is traversed longitudinally throughout its centre by a thick stratum of magnesian limestone and trap, which rocks form the principal constituents of the central midrib.

It has already been observed, in treating of the rivers of Búndi, that the watershed on both sides of these hills, north and south, is *towards* these hills, not away from them; and so markedly is this the case on the Kotah side, that streamlets having their source within a mile or so of the Chambal do not discharge themselves southward into that river, but flow northward to join the Mej naddi, the sole, or almost the sole, outlet for all the waters which fall on Búndi territory.

That this was always the case is highly improbable. There must have been a time when both the Banás on the north, and the Chambal on the south, shared more equally in receiving the water which fell on the great Búndi slate-bed; but, as has been stated, this slate is soft, hence easily acted upon by atmospheric or mechanical processes of erosion. The limestone and trap, on the other hand, are hard, hence more capable of resisting these disintegrating influences, and the dense band composed of these rocks gradually rose into prominence as the slate within which it lay was worn away on either side of it. To the north was the hard gneiss and mica slate in which the Banás had found its bed. To the south was the silurian sandstone, almost equally as hard, through which the Chambal had worn its channel: so that between each of these strata and the central band of limestone and trap, lay a gradually sinking basin of corroding clay slate, which ultimately retained the waters which formerly found an outlet both northward and southward, and these established for themselves new and independent channels, represented now by the system of which the Mej is the principal artery.

Rivers.—The Chambal, though not properly a river of Búndi, and never fairly entering Búndi soil, washes its south-eastern border for a distance of over 80 miles. Of these, the first 10 are through wild rocky scenery, the river having cut a deep precipitous channel into the sandstone rock.

Below this point a portion of Kotah overlaps the river, but the boundary-line returns to it again about 15 miles further down, and the river then continues to mark the Búndi-Kotah boundary, until it reaches the extreme north-east angle of the former State.

About a mile above this, just below Pálí, the Mej naddi, the principal, almost the only, drainage channel of the Búndi State, falls into the Chambal.

The important village of Keshorai Pátan is situated at an abrupt bend of the river, where the channel, after running in a north-easterly direction, suddenly turns, almost at right-angles, to the south-east, and, after a straight reach of 5 miles, turns back again with a still more abrupt elbow to its former direction.

This is the beginning of a series of sinuosities which the river maintains in its north-western course. It has a varying breadth of from 200 to 400 yards, and at some places, even at low level, attains considerable depth. "A section of the river taken at Kotah in December 1870 by Captain G. Strahan, R.E., gives a breadth of 560 feet, and a depth of 16 feet of water. The flood-level of 1858, the highest on record, is given as 68 feet above the ordinary winter level, and the height of the latter above sea-level as 745 feet. At Awhra, on the Central India plateau, the height of the stream, as trigonometrically determined by the Gwálior and Central India Survey, is 1,249 feet, giving a fall per mile to Kotah, a distance of almost exactly 100 miles, of 5 feet."*

At a point near the extreme southern border of the Búndi boundary, the river is fordable: so it is above Keshorai Pátan, near Gámoch, and at other parts lower down the stream. At Kotah and Pátan it is crossed by a ferry.

With the change in the nature of the bed of the Chambal, the character of the scenery alters completely. Above Kotah it is all precipitous rock, with wild glens and gullies, and thick tangled overhanging brushwood. Below Pátan, where the Chambal traverses the alluvial soil of the south Búndi basin, there are gently-sloping banks, occasionally very picturesquely wooded and much intersected by ramifying surface channels.

Several unimportant villages stud the bank, but with the exception of Keshorai Pátan, for whose site there was a special reason, no large villages are situated near the river.

* Note on Búndi by Lieutenant Leach, R.E., Assistant Superintendent, Topographical Survey of India.

The Banás plays but a very unimportant part as a Búndi river. Leaving the Rájmahal gorge, when, after its abrupt diversion through the gneiss hills of Todah, it turns again to the north-east, it crosses a small outlying patch of Búndi territory on the Jaipur border. At another bend, some ten miles down the river, it again touches upon Búndi, but only for one mile, constituting for that mile the boundary between Búndi and Jaipur.

The mountain ranges of Búndi have been already described as being connected on its western boundary by a semi-lunar ridge, with its convexity to the west. All the water falling upon this convexity ultimately reaches the Banás, while that falling on the concavity of the ridge goes to form the river system of Búndi. It is probable, however, that in pre-historic times, the soil on which the territory of Búndi now lies, had a much higher level than its present one, from which the rain-floods found their way directly into the Banás on the north-west, and into the Chambal on the south-east; but that this surface, having suffered erosion from atmospheric and mechanical causes, has fallen below the summit of this ridge, so that a new river system became established, of which the Mej naddi is the sole representative.

No water at all, therefore, from Búndi territory now finds its way into the Banás, except that supplied by the small tributary above referred to, and that only because the portion of territory through which it flows lies north of the long low ridge of hills described as the Awán range.

The Mej rises at an elevation of about 1,700 feet above sea-level in the Mewar territory, on the semi-lunar ridge above referred to, and, after filling the Dhunwárah tank, continues a course almost due north through Mewar for nearly 13 miles, entering the Búndi territory near the village of Nagar in a north-easterly direction.

After a course of two miles, the boundary-line between Búndi and Mewar again reverts to it; and continues along its bed for a distance of nearly six miles, after which the Mej becomes for the remainder of its length, about 92 miles, solely a river of Búndi, the only one indeed by means of which that territory is irrigated.

Making now a more easterly deflection to a little beyond Dablánah, it then inclines almost due east, and, after a course of about 16 miles in that direction, it turns abruptly to the south near Gudha, cuts its way through the central Búndi range of hills, and, emerging thence near Khatgarh, bends with a long and tortuous sweep again to the eastward, and finally skirting the base of the hill range, and maintaining a direction somewhat in conformity with it, falls ultimately into the Chambal near Pálí at the extreme north-west angle of the State.

Keeping in view, therefore, the division into northern and southern Búndi by the central midrib of hills, which was described in treating of the general topography of the State, the Mej irrigates both the northern and southern basins. Its chief tributary in the former is the Bájáwás, in the latter the Kurál.

To the north the watershed of the Mej basin keeps pretty closely to the line of the boundary, and the catchment-area is about 1,200 square miles. All the water falling on the northern half of the Búndi State finds its way into the Mej naddi before it cuts its channel through the central range, emerging through the narrow gorge at Khatgarh, where the rocks are not more than 400 feet apart.

The southern catchment-area of the Mej is perhaps a little less than its northern one, and what is remarkable is that, although the river Chambal for about 80 miles of its course forms the southwestern boundary of the Búndi State, very little water from that State finds its way directly into the Chambal. Indeed, in many instances, the Kurál, the main southern tributary of the Mej, extends its feeders up to within a mile of the banks of the Chambal, indicating that the northern bank of that river, composed chiefly of sandstone, has formed a dyke, which is higher than the transition basin which lies between it and the central Búndi range. It is further worthy of remark that in both the northern and southern basins of Búndi, the flow of the rivers and their tributaries is towards, and not away from, the great central range.

In northern Búndi the bed of the Mej is, for the most part, rocky, and its course subject to few inflections; but in southern Búndi, where it winds its way through a thick bed of alluvial soil, its course is much more tortuous. Never completely dry at any time of the year, it nevertheless ceases to be a flowing stream during the hot rainless months of the year, and becomes little else than a chain of pools more or less continuous. But during the height of the rainy season, when its pent-up waters are forced through the constricted gorge at Khatgarh, it becomes an imposing river.

Besides the two main tributaries above mentioned, the Mej is fed by numerous smaller ones, some of which deserve notice. Two tolerably important ones join it soon after leaving the Mewar border: one from the south near Dholánah, and the other from the north near Neri. Another, receiving the surplus waters from the lake at Hindolí, falls into the Mej about three-quarters of a mile below Bichri from the north. A fourth, called the Bhikahnallah, after passing through the gardens at Sátor and receiving the surplus waters from the tanks at Talógáon, Phúl-bagh, and Jainwás, falls into the Mej on its right bank just below Barágáon.

A fifth, being the outlet of the large Dugári lake, enters the Mej on its north side near Gudha: and a sixth, collecting all the water from the eastern extremity of the northern Búndi basin, joins the Mej just after its abrupt turn southward through the central range below Gudha. In the southern basin there are no tributaries worthy of special notice which are not included in the system of the Kurál.

The Baján is the chief tributary of the Mej during its passage through the northern Búndi basin. Rising in the irregular hills of the Mína Kerár near Itondah in the Mewar territory, and receiving the surplus water from the lake near that village, it enters Búndi territory shortly afterwards in a north-easterly direction, skirts the Jaipur border at Sujánpúra, enters that State, and, turning abruptly to the south-east, re-enters Búndi half-way between Gotrá and Búndi-ka-Gotrá, falling into the Mej near the village of Sádara. Its entire length is about 35 miles. The perennial stream flowing near Umar is one of its more important tributaries, and the Gargáin nallah another. Búndi-ka-Gotrá and Bál on its right bank, and Ranipur on its left, just opposite Bál, are the principal villages near its course.

The Kurál is the chief tributary of the Mej in the southern Búndi basin. It is produced by the junction of the Sukh and the Táí, and two tributaries of almost equal importance which unite at Singhodah, whence it follows an extremely sinuous course for a distance of about 26 miles to join the Mej near Pípaladah. It receives three sub-tributaries, two from the south and one from the north.

The northern tributary, the most important of the three, though not more than 14 miles in length, is the Bálándi nallah, which rises by numerous heads in the central Búndi range to the east of the capital between it and Khatgarh, and, after irrigating the land about Burá-Jáotah and Bháironpurah, unites with the Kurál near Ráitháli. These tributaries are all little more than rain streams, with here and there a few perennial pools.

The Kurál, lying for its whole length in the rich alluvial soil of south-eastern Búndi, has numerous villages dotted about its banks, of which the chief is Jaithil, on the road between Khatgarh and Kapran.

Of the two streams whose union is the source of the Kurál, the Táí naddi perhaps is the most important. It collects the waters of a great number of small streams which descend from the sandstone slopes of south-western Búndi; some of them rising from within a mile of the Chambal.

The total length of the Táí is about 35 miles, a length made up chiefly by considerable tortuosity in the lower portion of the

stream where it winds about in the alluvial soil of the plains, frequently dividing to form considerable islands.

The musk-melons of the Táí are famous both in Búndi and Kotah.

The Ghora Pachár, a tributary of the Táí, collects the small streamlets lying between the sources of the Táí and Sukh naddis, and, after a course of about 25 miles, joins the former stream near Pípaldah. The important village of Bárondhun lies on its right bank, and that of Nainwah on its left. At the latter place the water of this perennial stream is arrested by a stone dam below the village, which results in the production of a considerable reach of deep water, beautifully wooded on either side. It is crossed at the village by a boat-ferry. This stream is said to have derived its name from the slippery nature of its bed, all the upper portion of which lies in the sandstone, and is so slippery that it is difficult for horses crossing it to maintain their footing.

The Sukh river derives its principal sources in the Mewar territory, from the higher sandstone slopes which close the southern Búndi basin to the westward; the lower or southern horn of the semi-lunar ridge. It is from this same ridge that the earlier sources of the Mej take their rise; these flowing down the north-western slopes to ultimately irrigate the northern Búndi basin, while those descend the south-eastern slopes to join the Táí in the formation of the Kurál. Numerous other branches descend from the central Búndi range lying to the west of the capital, and unite into two principal tributaries, the higher one of which, and the larger of the two, enters the bed of the Sukh naddi below Merámpur, and the lower one below Barkherah. The Sukh has thus a course of over 50 miles, and, while its channels through the rock suffer little deviation, it, like the Táí, becomes very tortuous as it approaches its confluence with that stream. One of its principal feeders has cut a chasm for itself in the sandstone rock about 5 miles west of Ním-ka-Khera, at a place called Bhímlut. How this chasm about $2\frac{1}{4}$ miles in length was originated, it is difficult to conjecture, for it commences quite abruptly with a width at once of about 300 feet, and a perpendicular precipice of about 150 feet. The water falling into this chasm is only surface-drainage from the surrounding slopes during rainfall, and quite too insufficient to be credited with the capability of excavating so large a chasm in the solid rock. It can only be conjectured that it was formed during the epoch of subsidence of the overlying waters, when the hills of these regions first showed themselves above their surface.

The Gen is a small stream little over 20 miles in length, collecting the rainfall from a valley skirting the extreme south-western

the bund to be repaired, since which time the lake has borne the name of Kanak Ságar.

Dugári is held in jágir by Mucár Singh, a relation of the present chief. A very picturesque palace enclosed within meagre fortifications, stands on a prominent hill near the lake. The former is said to have been erected by Ráo Sághand Deoji, and the latter by the brothers Sirdar Singh and Umed Singh, to whom also is accredited the construction of the garden below the dam. The village is a tolerably prosperous one, containing about 2,000 inhabitants, and yielding an annual revenue of Rs. 9,000. There are six temples sacred to Vishnu, two to Mahádeo, and two Jain temples. The garden below the bund, irrigated by the water from the lake, is little better than a wood in which numerous fine trees are permitted to grow just as they please. There is no attempt at order, or interference in any way with their natural growth, or with the underwood which they shelter. After supplying this garden, the water is conveyed away by channels for the irrigation of the fields to the south of the village, of which there are about 1,500 bighas under cultivation. Wheat, rice, jowár, makka, turmeric, tobacco, sugarcane, and sweet-potatoes are chiefly cultivated. The waters of the lake also supply singhára nuts in abundance. Next to the Dugári lake, the one at Hindolí is the most important, a flood-stream running between a series of low hills of similar geological formation to that of Dugári; it has been dammed by a stone bund of considerable thickness, and the waters thus retained spread over an area of about one square mile. The result is a scene almost as picturesque as any the Búndi State can boast. The group of hills concentrated about the south-west angle of the lake is pleasingly diversified, and as the water forms bays and creeks where its margin winds amongst them, now washing their rocky bases, and then extending over shallow slopes or losing itself among thick beds of bending reeds, it combines to form a picture which never fails to elicit the admiration of the traveller.

The beauty of these features is still further augmented by the assistance they derive from artificial ones. One of the most easily accessible hillocks, overlooking the water, has been selected for the Sandoli palace, and an extremely graceful, withal massive, pile of buildings has been erected upon it, of which the square turrets, with their domed canopies, bracketed oriels, and overhanging eaves standing out crisp against the sky, are a pleasing prospect for miles around.

Circling the base of this hillock nestles the village, from the midst of which rise the vimanas of some of its temples. The bund itself, and much of the lower land lying beyond it, is covered

with large, wide-spreading trees, from amongst one group of which the spire of another temple is visible; and beyond the bund, at its north-eastern extremity, there is a group of exceedingly handsome memorial cenotaphs, all very nearly alike in design, and placed side by side in one line. They were erected in memory of Umar Singh, Partáb Singh, Jeswant Singh, and Sher Singh—all members of the family which formerly occupied the palace. Another cenotaph, though not so ornate, sacred to the memory of Rám Singh, also a member of the same family, stands at the other extremity of the dam.

The palace is said to have been built in Sambat 1706 by Partáb Singh, a scion of the reigning family; but the lake owes its existence to a merchant named Buda Ráo, who built it about four hundred years ago.

The town of Nainwah is situated between two tanks formed by artificial embankments; probably with the view of strengthening the fortifications of the town. The larger of the two is on the west. It is said to have been constructed by Nawal Singh Solankhi, brother of Rághodás, jágirdár of the pargana during the reign of the Emperor Akhár. In the building of this bund, a great deal of material resulting from the destruction of several large temples by the Muhammadans was used, some of the stones being unusually large in size. The smaller of the two tanks lies to the north-east of the town, and was probably constructed about the same period, if not by the same persons, as the former one.

Except the artificial sheets of water in and near the capital, there are few other tanks worthy of special description in the districts of Búndi. There is a tolerably good-sized one at Tálwás near the fort of Ajítgarh, but throughout the State, as is the case with most others in Rájputáná where there is no other available source of water-supply, every village has at least one, and sometimes two tanks used for purposes of irrigation, as well as for the supply of the usual domestic wants of the villagers.

There are two tanks of importance within the precincts of the capital: (1) Jait or Jodh Ságar, and (2) the Naulakhah Taláo; and there is one in tolerably close proximity also worthy of mention, *viz.*, Phúl Ságar.

The great gap in the central Búndi range, which suggested the building of a capital there, is peculiar in character. It seems almost as if the continuity of the southern ridge at this point had been forcibly rent by the detachment of a huge mass of mountain, which now occupies a site between the two ridges. There has thus been made an accessible entrance from the south, having outlets northward on either side of this detached mountain

mass; the western one giving exit to the Deoli and Nasírábád road, and the eastern one to the Tonk road. It is in this latter outlet, at the north-west angle of the city, that Jait Ságar is situated; advantage having been taken of the narrow gorge left there to build a dam of remarkable strength and enclose a considerable sheet of water, which offers one of the most picturesque scenes in the Búndi territory. When full, this lake is nearly seven furlongs in length, and averages about one and-a-half in breadth. It covers about 84 bíghas of land. Either looking up from the Gháti gate towards the point of influx of its waters, or proceeding a little further along the road which skirts its northern boundary and looking down towards the city—in both cases an exceedingly picturesque scene is disclosed to the traveller, in which hill and wood and prominent architectural features are most pleasingly blent. This lake is said to have been constructed by Jaita, a former Mína ruler of Búndi. On the bund stands an open palace, like many to be met with in Rájputáná, erected for the occasional visits of the chief. This is said to have been built by Sukhrám Dhábhái, and bears the name of the Sukh Mahal to this day. A lamentable occurrence is connected with the history of this lake. In Sambat 1763, Jodha Singh, brother of Ráo Rájá Budha Singh, the then reigning chief, was drowned in it by the upsetting of a boat at the Gargor festival, which has never since been celebrated at Búndi.

The Naulakhah Taláo is situated at the south-west angle of the capital, and is about two furlongs in length by about one in breadth. Though much smaller than the one just described, it too is very picturesque, and offers from its southern bank one of the most impressive views of the Búndi palace. It is the chief bathing resort of the inhabitants.

The Phúl Ságar, situated north of the Deoli and Nasírábád road, before reaching Taláogáon from Búndi, is the source of water-supply to the adjoining pleasure-garden, said to have been constructed by, or for, a concubine of Ráo Rájá Bhoj Singh in Sambat 1659. Here is a cheerful little summer-palace, with balconies overlooking a small walled-in basin of water crowded with lotus-flowers. The larger lake is beyond on the south side, and, at the height of a full rainy season, its limits extend as far as the village of Taláogáon on one side, and that of Rámpurah on the other; but as the soil which forms its basin is somewhat porous, it soon dries up.

History.—The history of the Búndi State is the history, so far as it can be extracted from chronicles and genealogies, of the family of the ruling chief, and of the fortunes of his clan in settling themselves in this part of the country. The annals of the

chief's family have been lately compiled by the hereditary bard and genealogist, under the supervision of the present Mahārāo Rājā. The chiefs of Búndi belong to the Hára sept of the great clan of the Choháns, and the country which this sept has occupied for many centuries is called Háraoti. The lineage begins, as usual, with the miraculous birth of a hero, who became a great conqueror; and the chronicle goes on to recite the names and deeds of many successive warlike chiefs. All that can be distinctly collected from these records is that the Háras went through the ordinary course of incessant fighting with rival clans for lands and dominion, that they drove out or extirpated the non-Rájpút tribes whom they found in occupation (a massacre of the Mínas in the fourteenth century is particularly mentioned, which cleared the country round Búndi itself); that they built strong places, and gradually acquired predominance in the eastern districts, which they still hold. The chiefs appear to have admitted the supremacy of the Sesodia chiefs at Chitor whenever the latter were strong enough to enforce it; and to have enlarged their borders at the expense or in defiance of the Sesodia suzerain whenever he was weakened by foreign invasions. Ala-ud-dín's sack of Chitor gave them an opportunity of this sort; the Hára country being protected by a range of hills and wilds from easy invasion out of the Mewar plains. There are numerous accounts of feuds and battles between Búndi and Chitor, two capitals distant about sixty miles; but the most dangerous enemy of the Háras in the fifteenth century was the powerful Muhammadan dynasty of Malwa, and it appears that at one time Búndi was taken and sacked by an army from Mándu under a son of Mahmud Khilzi (1457 A.D.), who left an officer in command of the fort. The Malwa armies seem to have constantly invaded and devastated all Eastern Rájpútáná, penetrating through the more accessible routes as far even as Ajmer; and in the beginning of the sixteenth century the Háras made common cause with the Sesodias in resisting the attacks of the combined forces of Guzerát and Malwa. We may conclude generally that these eastern chiefs were pressed hard by the Muhammadans from the open south-west country, until Ráná Sanga restored the power of the Rájpúts, and retook from the Muhammadans their most important fortresses in this quarter; but this brief period of brilliant revival ended with the great defeat of the Rána at Fathepur Síkrí; and Bahádur Shah of Guzerát soon after took Chitor, when Ráo Arjun of Búndi with his Háras was slain in the storm. Sher Shah the Afghan also marched down into this country, and again took Chitor; though, after his death, the Háras got possession of the great fort of Rinthanbor on their eastern

border, which had long been an imperial outpost. This they held as feudatories of the Sesodia chief ; but when Akbár undertook the pacification of Rájputáná, he induced the Hára chief to transfer his allegiance to the emperor of Delhi, and the fortress after a short siege. He (Rai Surjan) and his sons entered the service of Akbár, receiving rank and pay. From this time forward ceased the supremacy of the Sesodias, and began the connection of the Háras of Búndi with the Mughal emperors. Several of their chiefs took service with the emperors, obtained high rank at the Delhi Court, and received large grants of lands, which were alternately resumed and restored as the chiefs lost or gained favor, or took the wrong or right side in the dynastic struggles for the throne of Delhi. The bravery of the Hára chiefs in the field is constantly recorded ; they accompanied the emperor upon distant expeditions, and took leading parts in the political revolutions of the time. One of them fell fighting for Dára in the decisive battle near Agra (1658 A.D.), and of course his family became the object of Aurangzeb's revenge ; who, however, pardoned the Háras after a vain attempt to ruin them. Another chief had better luck in the battle for Aurangzeb's vacant throne, for he took the winning side of Bahadur Shah, while his kinsman of Kotah was killed on the losing side, whereby the Búndi family secured predominance for the time. Soon after, however, a furious feud broke out between the Búndi chief and the powerful Jai Singh of Ámber (now Jaipur), when the Búndi chief was driven out of his land, and died in exile ; while the Kotah and Ámber chiefs annexed large portions of his territory. His successor appealed to Malhár Ráo Holkar, who forced the Ámber Rájá to disgorge, and replaced the Búndi chief, keeping Pátan as payment for his services. After this the most important incident chronicled is the death of Ráná Ursi of Udaipur, who was killed by the Ráo of Búndi during a hunting-party, whence arose a feud between the two great houses which is not yet forgotten. From the time of the appearance of the Marathas in these parts, the Rájput States were constantly exposed to plundering excursions and heavy contributions, with occasional loss of territory ; and Búndi was among the greatest sufferers. In 1804, the chief of Búndi assisted Colonel Monson's expedition against Holkar through his country, and gave friendly aid when Monson was forced to retreat. From that time up to 1817, the Marathas and Pindáris constantly ravaged the State ; exacting tribute, and assuming supremacy. The territory of Búndi was so situated as to be of great importance during the war in 1817 in cutting off the flight of the Pindáris. Maháráo Bishen Singh early accepted the British alliance, and a treaty

was concluded with him on the 10th February 1818. Although his forces were inconsiderable, he co-operated heartily with the British Government. It was this connection with the British Government that raised Búndi from the lamentable condition to which it was reduced by the Marathas. The present chief is, by date of accession, the senior of the ruling native princes in India. He came to the throne in 1821, and has governed his country with ability and popularity for fifty-six years.

Population.—The following return is from an enumeration recently made, but it is only approximately correct:—

Census of the Búndi State.

CASTE.	POPULATION.				
	Men.	Women.	Boys.	Girls.	Total.
Bráhmán	6,734	3,331	3,164	2,244	15,473
Rájpút	2,393	2,186	1,251	928	6,758
Mahájan	4,660	4,210	2,128	1,449	12,447
Mali	5,291	5,285	3,347	2,374	16,297
Gújar	9,131	8,793	5,748	3,797	27,469
Mína	10,754	9,546	6,717	4,693	31,710
Chamár and Balai	10,460	10,425	6,486	5,128	32,499
Musalmán	1,591	1,539	871	658	4,659
Other castes	24,445	24,079	13,425	9,410	71,359
Totals	75,459	69,394	43,137	30,681	218,671

Castes, Clans, and Tribes.—The principal Hindu castes in the Búndi State may be thus classed:—

Bráhmans, sub-divided into Sádu, Gaur, Sanadh, Parikh, Gújar, Doima, Palliwál, and Nágars; in the town predominate Sarusruth, and Síkhwál in small numbers. They have, as usual, some tincture of letters; some of them take service, and a few cultivate: there are Bráhmán patels in many villages. Of the official families, the first in consideration and importance belongs to the Nágár Bohra division of Bráhmans; which family has been for two generations in the service of the State; one of its members having been prime-minister during a long and important period.

Rájpúts are divided into Háras, Solankhi, Chohán, Ráthor predominate, but Sesodia, Gaur, Ráthwa, Dubia, Parihár are found in small numbers. The principal houses of the Rájpút aristocracy are Kápran, Dugári, Nagki-ka-Kherá, Jujáwar, Gotrá, Pagára, and Bárandan. The first five are offshoots of the stock of the ruling family. Pagára is Solankhi; and Bárandan, Ráthor. There are other minor Sirdars and Thákurs. All hold their lands

on a fixed tenure, varying with each estate, some doing service in person, others sending a contingent or paying a money commutation. The Rájputés, as a body, own or cultivate land, or take service.

The commercial classes are either orthodox Hindus or of the Jain sect, with the usual sub-divisions known in Northern India; Agarwálás, Mahesri and Oswál divisions predominate. To these classes belong also many of the writers and accountants in the service of the State. The Chárans and Bháts, keepers of genealogies and family bards, hold in Búndi their usual rank of honour; they sometimes take service, or trade, and occasionally hold grants of land.

Bháts act as marriage negotiators and reciters of genealogical history of all classes of Hindus. Both Chárans and Bháts follow the profession of Banjáráhs, or carriers and traders with pack-bullocks.

Káyáths are of two classes in Búndi, *viz.*, Máthur and Bhut-nájar. These again are sub-divided into Desi (native) and Pardesi (foreigner), who do not intermarry with each other, and whose customs differ. The profession of all is service as writers, and, as a class, they are neither rich nor poor.

The ordinary artizan classes need no special description: the skilled craftsmen are not numerous. The Lohárs or smiths can manufacture only the rudest rural implements, and can scarcely maintain themselves by their profession alone, without adding to their incomes by agriculture. The town of Búndi, however, contains the shops of eight or ten blacksmiths who manufacture daggers and bits, the former of which are famous in Rájputáná.

Lohárs in this State also extract iron from the ore, by smelting, in several places.

Lakhera or makers of lac bangles. They also paint wooden dolls and other articles with coloured lac.

The miscellaneous professional or manufacturing castes and callings common in India are represented; but there is no peculiar manufacture, and local industries are mostly in the rough; all the finer and better kinds of commodities being imported.

Professions followed by Musalmáns.—In the Búndi State, besides the common sub-divisions of Shekh, Sáyyíd, and Pathán, are found the Mewáttís and a few of the Bohra sect. The Musalmán usually prefers service—military, civil, or domestic—though he also practises such industries as cotton-dressing, embroidery, and the like. The Bohra is almost wholly a trading class;

The Parihár Minas.—The portion of the territories of Búndi, Mewar, and Jaipur inhabited by this tribe is called the Kerar, and is situated in the immediate vicinity of Deoli, the head-quarters

of the Háraoti and Tonk Agency. It extends in an easterly direction from the town of Jaházpur in the Mewar State to a distance of about 12 miles.

The Parihár Mínas are said to be a cross between the Parihár Rájput of Mundor in Marwar, and the aboriginal Mínas of Rájputáná divided into 38 clans. It seems certain that they represent the earlier tribes whom the Rájputs drove into the jungles, where they did not exterminate them when they seized this country, and they are probably in the main of half-blood between the conquered and conquerors. They profess to trace their descent from Shoma, son of Nahar Ráo, king of Mundor, who married a Mína woman, settled in the Kherár, and became the progenitor of its present inhabitants, and of others scattered over the adjacent districts of Ajmer, Jaipur, and Búndi. An inscription in a temple at the Kerar village of Umar would fix the date of their advent about the twelfth century A.D. Within a radius of 50 miles, every village contains two or three families of Parihár Mínas. They do not intermarry with the other groups of Mínas in Sirohi and in northern Jaipur and Alwar.

The Parihár Mínas inherit much of the pride, spirit, and superstition of their Rájput descent. As a plundering class, they have ever been conspicuous as daring and expert leaders. Until lately, dacoity was with them a profession and a favourite pastime, and they have always taken advantage of public disorder to commit great excesses. On the other hand, they have usually been put down with much severity. Zálím Singh of Kotah slaughtered them far and wide; nor were they brought under control after 1857 without very sharp and summary processes.

Personally they are athletic and brave, tall, handsome, and pleasing in address, and sensible of kindness, but they are blood-thirsty and revengeful. Private quarrels are always attended with serious crime.

Except the cow and wild-boar, they eat flesh of all kinds; for this abstention from the latter, a legendary tale is told of a former Parihár prince having been led to a stream near Pokur while pursuing a boar, the waters of which cured him from a loathsome disease. Since then the animal is considered sacred by all clans descended from the Parihárs.

The Parihár Mínas indulge freely in spirits, opium, and tobacco.

The bow, spear, and katár are their chief weapons, in the use of which they are very expert. Some have matchlocks.

The Parihár Mína follows the Rájput marriage-law, which prohibits marriage between two members of the same kindred clan. Differing from Rájput custom, the Mína receives payment for his daughter. Mína widows re-marry, but not in the

The total revenue of the State is estimated at Rs. 10,14,000, of which about Rs. 8,50,000 is derived from the land. The assignments, allotments, and endowments diminish by about Rs. 3,50,000 the land-revenue demand of the treasury; leaving the effective income of the State at about Rs. 6,64,000, of which about Rs. 64,000 comes from customs. But it is not possible to obtain accurate accounts of the finances, though these figures probably give a fair general idea of the State's resources.

For purposes of administration, the State is divided into ten parganas, namely:—

(1) Bárodiah.	(6) Lákheri.
(2) Bánsi.	(7) Ganidoli.
(3) Nainwah.	(8) Keshorai Pátan.
(4) Tamaidi.	(9) Loecha.
(5) Kárwár.	(10) Sillor.

These again are sub-divided into 22 tálukas, each presided over by an officer called the tálukdár, who exercises revenue, civil, and criminal jurisdiction within certain limits. Civil cases are adjudicated chiefly by arbitration (punchayat), or else by the tálukdár himself. As a general rule, the cases disposed of by this official are not of large value. Both parties have to pay $6\frac{1}{4}$ per cent. as court-fees. No regular procedure prevails for execution of decrees. As soon as a case is disposed of, some arrangement is effected, either by instalments or otherwise, for payment of the debt. No written codes exist. Lighter offences can be tried by the tálukdár, whose powers in this respect extend to 15 days' imprisonment and a fine of Rs. 11. He cannot take any cognizance of serious offences, but only reports such complaints to a higher authority.

In revenue matters, only disputes regarding land between inhabitants of the same village can be decided by the tálukdár, but those in which two villages are concerned must be reported to head-quarters, where they are either disposed of, or the tálukdár is empowered to adjudicate. This officer also conducts all revenue matters regarding the State, making assessments and realizing the rents, which he from time to time remits to the treasury at the capital.

Nominally the tálukdárs are invested with police powers, but they have neither time nor inclination to suppress or detect crime. If the person robbed is fortunate enough to trace either his property or the perpetrators, the case goes up for trial before the Hukam-ki-Katcheri; otherwise there is an end of the matter after a summary local enquiry by the tálukdár.

Offices and Courts of Justice.—In the capital there are eight katcheris.

The first is the office through which all matters are reported to the chief, and his orders communicated.

The second, or court of justice, is presided over by Bohora Champa Lál, younger brother to the late minister, Jíwan Lál. He cannot be said to possess the power of taking cognizance of cases filed directly in his court. All petitions and complaints must come through the first-named office, with the authorization of the chief for enquiry and decision. Cases of a serious nature, both civil and criminal, have to go up for final orders before the chief, with the recommendations of the officer presiding over the court.

In this State there are no thánas nor any regular body of police. On the chief trade and passenger routes, chaukis or outposts of six men each are established to prevent thefts and robberies. The men belong to the Sibandi force. Except the capital, no other town has a kotwál.

Sanitary arrangements are not thought of in any of the towns.

There is a charitable dispensary in the capital, over which is a native doctor entertained by the Ráj.

Minor Establishments.—Besides the eight principal administrative departments mentioned elsewhere, certain minor establishments require a passing notice.

The mint of Búndi coins gold, silver, and copper pieces—the first in very inconsiderable numbers. The silver piece weighs 10 máshas and 7 rátis, of which 4 rátis are alloy. The Búndi piece is about 18 máshas. The reverse on all coins bears the Queen's name since 1869. The metals are heated and then stamped with a die, the whole process being done by hand.

Detail of the coin manufacture in Búndi from Sambat 1929 to 1932.

Year.	GOLDMOHURS.		RUPEES.		8-ANNA BITS.		4-ANNA BITS.		PIECE.	
	No.	Value in Rupees.	Fresh coined.	Old rupees re-stamped	No.	Value in Rupees.	No.	Value in Rupees.	No.	Value in Rupees.
St. 1929 or } 1872 }	15	219.6	1,00,000	1,50,000	600	300	100	25	15,000	588-3-9
Do. 1930 or } 1873 }	...	...	35,000	1,50,000	400	200	80	20	...	...
Do. 1931 or } 1874 }	...	...	40,000	1,50,000	600	300	100	25	...	.
Do. 1932 or } 1875 }	10	175	60,000	1,75,000	400	200	100	25	...	.

Two-anna bits are not coined, there being no demand for them.

The Amber or Kothār is something like a commissariat department. It not only supplies the chief's kitchen, but distributes the feed of the Rāj elephants, horses, camels, and bullocks. A certain portion of the grain taken as rent is kept here, and distributed to the Rāj servants in rations in part payment of salaries.

The jail at the capital is a commodious building outside the city-walls, and was adopted for its present purpose in 1870. The premises consist of a spacious rectangle 107 feet long by 81 broad, with open corridors on three sides.

Education.—In the English school at the capital there is a schoolmaster, with two or three pupils who pretend to learn English. A number of scholars, however, read Sanskrit, Urdú, and Hindí. Five indigenous Pátshállas are attended by a large number of boys learning Hindí. Large villages have these indigenous Pátshállas to teach letter-writing and the elements of arithmetic in Hindí. Encouragement is given to Hindí and Sanskrit education, the present ruling chief being deeply read in both, and the sacred writings. His Highness further personally supervises the education of the sons of his Sirdars.

Post Office.—An English post-office has been in existence since 1858 or 1859 in the capital.

Agriculture.—Principal Crops—Kharíf Crops—

- | | |
|----------------------|---------------------|
| 1. Jowárí. | 11. Kuluth (grain). |
| 2. Maize. | 12. Kola (grain). |
| 3. Urid (cereal). | 13. Berti (grain). |
| 4. Hemp or Jute. | 14. Bajrá. |
| 5. Sugarcane. | 15. Múng (cereal). |
| 6. Til (oil-seed). | 16. Al (cereal). |
| 7. Cotton. | 17. Indigo. |
| 8. Chowula (cereal). | 18. Koda (grain). |
| 9. Gur. | 19. Rice. |
| 10. Moth (cereal). | 20. T. |
| | 21. S. |

Names of crops depending on irrigation—

1. Barley.
2. Wheat.
3. Opium.
4. Gram.
5. Arhár-Tír (cereal).

own family, it is as follows:—For one ploughing of a bigha: hire of plough, bullocks, and labourer, Rs. 0-8-0; price of manure and cost of carriage, three cart-loads, Rs. 1-14-0; pair of bullocks for one watering with two labourers for three days, per bigha, Rs. 1-14-0; six labourers for weeding, $1\frac{1}{2}$ annas per man, Rs. 0-9-0; cost of implements per bigha, Rs. 0-3-0; fencing and other miscellaneous cost per bigha, Rs. 0-3-0. Besides cost of seed, and rent of land. Following the mode of cultivation mentioned above, according to these rates the cost per bigha for the kharíf would be—For jowár, Rs. 2-3-0; for rabi per bigha of wheat, Rs. 9-14-0. If the farmer owns cattle and plough, and has adult male relations to assist him, then the actual cost would be about—for the kharíf of a bigha of jowár, Rs. 0-4-0; for the rabi crops of a bigha of wheat, Rs. 2-0-0. Add to this, price of seed, and rent of land, which latter greatly varies, and therefore cannot be given in this calculation.

The kharíf crops are more profitable to the farmer, as the cost of cultivation is less, and the outturn larger, than those of the rabi; opium excepted.

Agriculture.—The mode of cultivating depends on the monsoon rains, bārání or mál land, and cháhi or irrigated land. The manner of preparing both kinds of land is substantially the same. In the months of May and June, the land is first furrowed twice, by either the common plough or the kalli, to retain sufficient moisture from the earlier showers. When the soil becomes moist by one or two falls of rain, it is again ploughed by the plough or kalli. The process of finally preparing the land for sowing does not take place till the ground has been ploughed a third time after one or two heavy showers. For the kharíf crops the seed is sown broadcast, and the land is immediately after lightly ploughed. When the newly-grown crop is about a foot high, the plough is again driven in parallel lines. Land prepared by the kalli requires very little weeding, for it furrows deep and removes the roots of grasses, &c. Land prepared by the plough alone requires one or two weedings with a small hánd-hoe. Land required for cotton is weeded by the hand, and, as well as that for sugarcane, requires much tilling with a trowel or kodáli to increase the outturn. From the time that the grain begins to sprout till the crop ripens, a good deal of watching is necessary to protect it from squirrels and parrots by day, and from deer and wild-hogs at night. Each member of the husbandman's family takes his or her turn in this task. A small hut perched on poles, known all over India as *machán*, is built for the watcher to take his place at night. After the crop is cut, the sheaves are deposited in the threshing-yard. There are one or two yards

common to every village, where all the grain is trod out of the ear by cattle, and then winnowed by being held to the wind in sieves. The produce is then partitioned between the State and the ráyat. The stalks, which are utilised as fodder for cattle, may be removed, but no grain can be taken away till the demands of the State are satisfied.

Among the kharíf crops, only maize and cotton are manured. About eight cart-loads of manure are laid to the bigha. Night-soil, cow, goat, and sheep dung, ashes, and all sorts of refuse, are heaped together near villages, and afterwards utilised as manure. The best kind is the dung of goats and sheep. Fuel being so dear in Rájputáná, cow-dung only of the rainy season, which cannot be made into cakes, is thrown into the refuse heaps for manure. For sugarcane, the preparation of the ground with plough and kalli is the same as mentioned above. The quantity of manure is also eight cart-loads. It is, however, profusely irrigated with well water, and is well weeded. It is irrigated eighteen or twenty times at intervals.

Different kinds of cultivated land.—Cultivated land is divisible into five kinds, viz.—

1st.—Goraila, or land adjacent to villages of higher level than others.

2nd.—Káli, the soil of which is black and tenacious.

3rd.—Dhámni, the soil of which is yellowish-brown.

4th.—Bhúr or Bhúra, generally found near rivers, the soil of which is sandy.

5th.—Búra, the soil of which is yellowish-brown mixed with gravel, being situated near hills.

The first two kinds of land are culturable both by irrigation and by the monsoon rains, called cháhi and bārání. Irrigated or cháhi goraila produces two crops in the year. Among kharíf crops, maize is sown, and, after it is gathered at the end of the rains, barley is cultivated, which is preferred to wheat, as giving a larger outturn on such soil.

Unirrigated or bārání goraila, i.e., depending on monsoon rains, can only produce two crops when sufficient showers fall.

Káli cháhi, or artificially irrigated káli land, also produces two crops. After gathering the kharíf, it is sown with wheat, barley, and opium. Bārání káli, or land depending on monsoon water, produces only one crop, either kharíf or rabi, at the cultivator's pleasure.

Dhámni.—Its produce is smaller than that of the goraila and káli, and it gives only one crop in the year. In the *kharíf*, til, jowár, and bájrá, and in the *rabi*, gram, &c., are grown.

The fourth, or bhúr, when in the bed of rivers, produces wheat, barley, musk-melon, water-melon, cucurbitaceous plants, and vegetables, especially the egg plant. Bhúra, when not near rivers, is only sown with arhár, múng, and jowár.

The fifth, or búra land, produces mostly múng and jowár.

The last three kinds of land are always bārání—depending on monsoon rains for irrigation. Land newly reclaimed from jungle, after being prepared with plough and kalli, is always sown with tíl, the second year with jowár, and the third with gram. The reclamation is then complete.

Husbandmen in Hárati do not consider it worth while to manure any but land artificially irrigated, which consists of the two kinds known as goraila and káli. Sugarcane and opium can be grown only on cháhi land. In the dry beds of tanks, if sufficient moisture exists, sugarcane is also grown. Soil irrigated by wells and tanks (cháhi) is manured, and once ploughed before the commencement of the rains; after some showers, kharíf seeds are sown, and it is again ploughed. If there be large accumulations of rain-water, sufficient time is given for the soil to dry. Maize and cotton lands are properly weeded, but jowár is only ploughed when the shoots are a foot high.

The latter cannot be injured by the feet of men and cattle during ploughing. Three or four such weedings and ploughings take place.

Cháhi land for the rabi crops is first manured, and then undergoes four or five ploughings in June. It is then levelled with the kalli, which breaks the clods. In the beginning of November, when the sub-soil retains sufficient moisture, the rabi crops—wheat, barley, opium, &c.—are sown. When the shoots are about four inches high, the soil is once more irrigated. Opium alone is well weeded.

Bárání or unirrigated soil is prepared before and after the rains, similarly to cháhi. The sowing and weeding of the kharíf crops on this soil are also similar to the cháhi.

For rabi crops this soil is ploughed four or five times during the rains. When the surface, with the sub-soil, becomes sufficiently moist, wheat, barley, gram, &c., are sown. The mode of harvesting, &c., has been given in another place.

As grass is very plentiful in the country, the people are rather careless about fodder. They have the stalks of jowár, maize, and bájrí as high as two feet above the ground. These stalks serve as manure when ploughed in.

Cultivated Area.—The cultivated area cannot be given exactly, as it varies greatly each year. Sometimes a large quantity

of new land is brought under, at others large areas are thrown out of, cultivation, and remain fallow for some years. The area of 10,08,000 bighas supplied by the State returns can only be an approximate figure.

Besides the actual cultivated area, some 23,00,000 bighas are culturable waste, and the remainder wholly unculturable. This cannot be a matter of surprise, as that portion of the State called the Bárar is rocky and sterile with a scarcity of water, and its larger area is unculturable. The average extent of about four miles on the borders of the Chambal is so cut up with ravines, that no cultivation is possible.

Land Tenures.—A hereditary right to possession of land undoubtedly exists in Búndi, though it is the practice of the State to discourage and ignore it. The zamindárs assert the right most distinctly, and besides asserting their right of sale and mortgage, they also claim the privilege of re-occupation at will.

The State has the option of realizing its dues from the cultivators either in cash or in kind, according to established rates.

Jágírdárs.—Villages in jágír are granted only to members of the ruling family, and, in exceptional cases, to Rájputís of other clans. Villages are also given to officials in lieu of pay, but are liable to resumption when their services are dispensed with; though, as a rule, such resumption is not enforced in cases of hereditary servants, of which there are several families in the State. But more depends on the will and pleasure of the reigning chief than on any established rule or custom.

Owners of jágír villages realize their dues on land in the same way that the State does. They, however, do not enjoy rights of grazing, and of realizing seigneurial dues from forests and customs, except where these privileges have been granted by the chief. The original terms of jágír grants to relations and connections exacted three annas in the rupee on the rental, but have been much modified latterly; the grants to sons and wives of the chief, including concubines and personal household, are totally rent-free. Personal service is also exacted from the regular jágírdárs, who by its tenure are obliged to maintain both horse and foot. But the number to be maintained is more dependent on the will of the chief than on any fixed rating. According to the official account, the will of the chief in this, as in other matters, is supreme; he can enlarge a jágír, or resume it for misconduct.

The Bhúmia is always a Rájput; there are now few of them in Búndi. Where there is a Bhúmia in a village, he has a few bighas of rent-free land, as service for which he represents the State in local boundary disputes, keeps guard over forts, towns, and villages during the absence of the chief from the State, when

the regular forces accompany him, and keeps watch and ward over any parties, foreign or native, that pass through his villages. Bhúmias, however, do not pay compensation for thefts that may occur within their limits. As stated before, their holdings are rent-free, but every third year they have to pay a third to half of their annual income as gift. On the other hand, the Bhúmia gets a perquisite from the cultivator of a seer for every maund that is the State's due. Chouthbatta is the name given to a poorer class of Rájputs who have been accorded the privilege of cultivating lands on payment of only a fourth of the produce. They discharge similar functions to the Bhúmia, but are excused the presents every third year; on the other hand, they do not enjoy the grain perquisite from the cultivators. Their number is comparatively large. Sársri is a term equivalent to chaukidár in this State. Some years before, they had rent-free lands from the Ráj in every village, and were responsible for its protection and that of all property within its limits. The office was hereditary, and the holders were chiefly, if not entirely, of the Mína caste. The present chief in 1860-61 dismissed the whole class, and resumed their lands. This was owing to his having, on the institution of the international courts, had to pay compensation to foreigners robbed in his territories, and his determination not to maintain an expensive police if called on to make good such losses. The consequences of this measure have been felt in the frequency of theft and petty robberies.

Patels are not hereditary officials in the State. To obtain the office, applicants have to pay a large bonus according to the size of the charge. They can be removed for misconduct, or at the pleasure of the Ráj, except in cases where the contract is for a fixed period. As certain privileges are attached to patelships, they are eagerly sought by substantial villagers. Patels are entitled to select the best lands and as much as they can cultivate, paying rent at the prevailing rates; they also get from ten to twenty rupees, according to the size of the village, during each harvest from the collections made for general village expenditure, their contributions being only half of the usual rate realized from others to make up the common fund. They also obtain a certain quantity of grain from each cultivator when the produce is harvested. Their duties are to increase cultivation, to furnish supplies to officials, to execute all orders of the State to assist in the measurement of land, and to keep the collecting officer acquainted with the circumstances of each cultivator. Besides the State demand, the cultivator has to contribute his share to make up the perquisites and allowances of the patel

patwári, and other village officials, and towards the common fund of the village for various expenditure including that of collection. In the case of a cultivator having a well of his own, he obtains the right of pledging his land to borrow money, but the officials declare that he cannot sell it.

The village Balai performs many of the functions of a chaukidár, and is the immediate assistant of the patel. He has a red rod of office similar to the harkara. Grass, fodder, fuel, and other supplies are collected through him for parties entitled to have them. He has no land, but is entitled to a certain quantity of grain from every cultivator, and presents on occasions of marriage, &c.

Each large village has a patwári of its own. For hamlets, a group of three or four has one. He receives from eight to ten rupees for stationery, &c., and one or two rupees for pen and inkstand, from the common village fund, and two annas for each holding during assessment from each cultivator. He also receives a certain quantity of grain before the produce is taken away by their owners. His duties are the preparation of the assessment-rolls, the payment of the rent through him, and keeping the kháta or common fund account.

The village Shahina is a Ráj servant on Rs. 3 a month, and gets a small quantity of grain from each cultivator. He performs the duty of watching the crops for the Ráj, and is responsible that they are not stolen or removed before payment of rent. He sometimes performs police functions.

Rent-rates, &c.—There is no general established rate of rent per bigha. Almost every village has separate rates; no fixed rule prevails for its determination, and the procedure is altogether arbitrary. For instance, in one village a certain sort of land pays 11 annas a bigha, while in another the very same sort pays Re. 1 and Rs. 1-2. The rate, however, greatly depends on the outturn. It is impossible, therefore, to specify them all, except recording minimum and maximum rates. Culturable waste, when first brought under cultivation, pays 1 anna per bigha, which goes on increasing yearly till the fourth year, when full rates are charged. The rates as mentioned above are—goraila, when irrigated maize, cotton, barley, wheat, &c., per bigha, Rs. 2 to Rs. 2-4; for opium and tobacco, similar soil, Rs. 2-8 to Rs. 5; sugarcane and turmeric, Rs. 6 to Rs. 6-8. Báráni goraila 11 annas to Rs. 1-4. Any cultivator digging a well is remitted 2 to 6 annas per bigha for four or five years. The assessment of káli soil, both irrigated and unirrigated, *i.e.*, depending on monsoon rains, is similar to that of the goraila. Dhámni is assessed at 11 annas to Re. 1 per bigha.

Bhura, where irrigated by monsoon rains, pay from 7 annas to Re. 1 per bigha.

Bhura, when situated near, or in the bed of, rivers when cultivated by the Kírs, is assessed for cereal crops at Rs. 2 per bigha; for vegetables, melons, and pumpkins at Rs. 1-13 to Rs. 2. The regular cultivating class, however, pay less, *i.e.*, from 11 annas to Rs. 1-4 for similar land. The rate for burru is similar to that of bārání bhura. There are besides cesses under various names and pretexts for incidental charges and village expenses. These details refer to places where the rent is paid in cash, but a different account is necessary for those which pay in kind or where the battai system, *i.e.*, division of produce, is in vogue.

In battai from one-third to half of the kharíf produce is taken by the State; of the rabi, from one-third to three-sevenths.

Mode of collection.—Where the rent is payable in cash, the tálukdár or his subordinate goes the round of the villages before the harvest is gathered, and measures the holdings of each cultivator. When this is finished, the collection begins, which takes up about two months. Half the rent of the maize crops is taken in advance before even the measurement is taken. At the head-quarters of each táluka is a fotidár who takes charge of the collections as they come in, and remits them to the capital, either in cash, or by húndis on city bankers.

Battai, or division of produce, takes place as follows:—When the whole produce is stacked in the common stacking-yard of the village, called a kalián, the revenue officer proceeds to the village and divides it according to the proportion due to the State and the tenants. The grain so collected is either stored and afterwards sold on the spot, or sent to Búndi, as ordered.

Communications.—The main road through the State is from Deoli cantonment toward Kotah and Jhálawár; it has recently been demarcated and smoothed out so as to make a practicable fair-weather road. The road from Tonk to Deoli crosses the north-eastern corner of Búndi, and has also been put in order. Over the rest of the country there are mere tracks, which serve the purpose of local traffic.

Passes and Trade Routes.—There are two passes through the town of Búndi—one through which the road to Deoli lies, called the Maidak Dara; and the other through which leads the road to Tonk, called Gunésh Gháti.

The traffic route from Jhálrá Pátan and Kotah northward passes through the Maidak Dara for Deoli and Ajmer, and through the Gunésh Gháti for Tonk. There is another route from the north east through the Lákheri Ghát to Keshorai Pátan, and so to Kotah. Another frequented pass through the Búndi

hills is near the village of Khinia, 18 miles south-west of the capital.

The Rathi Gháti is situated eight miles south-west of Búndi, and is used by foot-passengers from Tonkra and other places in the State on the north, to Gúrhá and others on the south.

There are many other Ghátis over the hills from one village to another, but they can only be climbed by men on foot, and cannot properly be called passes.

Towns.—Búndi, next to Udaipur, is the most picturesque city in Rájputáná. Indeed, the city itself, and especially the palace, rising up above the city in pinnacled terraces upon the steep side of a mountain having an elevation above sea-level of nearly 1,500 feet, is quite as striking, and as characteristic of its country and period, as anything at Udaipur.

The town is situated on $25^{\circ} 27'$ north latitude, and $75^{\circ} 41'$ east longitude, and occupies an area of over two square miles. Its site is very peculiar. The double ridge of hills which has been described in the notes on the general topography of this State, has at this point fallen into a kind of disorder. This range has been described as consisting of two ridges of hills running almost parallel to each other through the whole length of the Búndi territory, the continuity of which is broken at the site of the capital and at Khatgarh. At the latter place, the interruption is simply that produced by a current of water during the subsidence of the universal ocean, rushing over a rocky impediment, and gradually cutting a channel through it. Something of the same kind doubtless occurred near the site of Búndi; but there seem, besides this, to have been other disrupting influences at work, for a large mountain mass appears to have been detached from the southern ridge, and forcibly driven into the valley between it and the northern ridge, so that a Y-shaped channel became established, of which the present Deoli and Nasírábád road, and the Tonk road, respectively represent the western and eastern arm, while the Búndi and Kotah road represents the southern leg. The capital stands at the apex formed by the junction of both arms with the leg; a position which could not possibly fail to impress the scene with strong characteristic features. The streets and houses rise and fall with the unevenness of the ground, and some of the suburbs have crept upwards on both the northern slopes. The palace, an imposing pile of very irregularly massed buildings, crowns the whole, extending up on the slope which closes the northern side of the city. Below is a large range of stable-yards and other offices, appropriated for the use of the various members of the palace establishment. Above this rise the reception courts and halls of audience; over which again are ranged the

more private chambers and receiving rooms of the court. Higher still, rise the crenelated battlements and columned chatris surmounting still more private apartments; and finally a stone causeway leads upwards to the summit of the ridge, where the main fort and the chief's most secluded recesses are situated.

The city is entirely enclosed within walled fortifications, through which ingress and egress are obtained by means of four gateways, *viz.*, the Mahal gate on the west, the Chaogán gate on the south, the Mína gate on the east, and the Ját-Ságar gate on the north-east. One tolerably regular street nearly 50 feet in width, runs throughout the whole length of the city from the palace to the Mína gate, and perhaps the most picturesque sight to be seen anywhere in Rájpútáná is the turn of this street as it leads up towards the palace, during any of the principal fairs, when it is thronged with people dressed in their gayest colours. The other streets are all narrow and very irregular: the upper-storeys of the houses often bracketed-out and surmounted with well-projecting eaves-stones, so that the streets never suffer very much from the direct rays of the sun.

There is one large temple sacred to Devi on the fort hill; and another one in the southern suburb of Chaogán. Of Jain temples there are 12, and some 15 or 16 others are devoted to Vishnu. About 400 smaller temples and shrines sacred to Mahádeo are scattered about the town.

Shut in, as the city is, so much by the surrounding hills, there is not much of interest to be met with in the environs of Búndi. The fortifications of the city on the north and south sides are carried up to, and over, the summits of the adjoining hills; and on the northern one, at an elevation of nearly 1,500 feet above the level of the sea, and between 500 and 600 feet from the plain below, stands the fort. There are four approaches to it: one from the palace, which of course is a private one, one from the Gháti gate near the Sukh Mahal, one from Birkhandi, and one from Phúl-bágh. Beyond the natural strength of its position, there is little of interest to claim attention. At the south-west angle of the hill on which it stands runs a spur which is surmounted by a large and very handsome chátri called the Suraj chátri, or sun-dome, whose cupola rests on 16 pillars, and cannot be less than 20 feet in diameter. Beyond this, to the northward, near the village of Rámpura lies the Phúl-bágh, constructed during the reign of Ráo Rájá Bijay Singh; and to the south again of this, close to the Deoli and Nasirábád road, barely two miles from the city, is the Nayá-bágh, still in process of construction. Both are private places of retirement

for the chiefs of Búndi, in the cool shade of which they often find a pleasant retreat from the glare of the city.

Immediately to the west of the city rises an abrupt cliff, véry nearly as high as that on which the fort stands, surmounted by a small mosque, to which a rather strange history is attached. It is related that a certain person known as Mirán Sáhib, and celebrated for his powers as a magician, subjugated to his service a genius named Zen Khán, whom he treated with great cruelty. One day, however, surprising his master in a state of uncleanness, this genius prevailed over him and slew him ; yet even then he found that he was unable to free himself entirely from this arch-magician's influence. Mirán's tomb is at Ajmer, and a Dargáh to his name exists in Amroha near Moradábád ; but a member of the reigning house of Búndi, having in some way benefited by the mysterious arts of this necromancer, erected the smaller Dargáh which now surmounts what is known as the Mirán Sáhib-ka-Dargáh.

Between this and the city-walls lies the Muhammadan graveyard. To the south of the city, as the view opens out on to the plain of the southern basin, there are a few scattered remains of former pleasure-gardens, with here and there a monumental cenotaph. One large and very handsome one, rapidly falling into decay, is dedicated to one of the royal foster-brothers of Ajít Singh's time. Leaving the city by the Tonk road at the Gháti gate, and skirting the northern bank of the Ját-Ságar, several pleasure-gardens, still in tolerably good repair, are met with. There are six or seven such gardens flanking both sides of the road, terminated at length by the Ser-bágh or Mahásatti, the place of cremation for all the chiefs of Búndi, to whose memory cenotaphs have been raised. These are of the same style and as richly ornamented as those to be met with in the similar mausolea of other Rájput capitals ; and they record terrible sacrifices of human life.

The following is a list of the principal monuments, with the names of the chiefs to whom they are dedicated, and the number of women who became *sati*, or were burnt at the funeral obsequies of each. We may be permitted, however, to conjecture that these figures are no more authentic than other statistics of Asiatic books of kings ; and that a desire to enhance the pomp and barbaric ceremonies of a chief's funeral may have sometimes influenced the recorders. It will be remembered that the monuments are often erected several years after the deaths they commemorate.

	Satis.		Satis.
1. Ráo Rájá Satru Sál	... 95	9. Máharáj Kummer Gopináth ...	...
2. Ráo Rájá Bháo Singh	... 35	10. Máharáj Bhört Singh	... 12
3. Ráo Umrád Singh	... 3	11. Máharáj Bhím Singh	... 84
4. Máharáj Jodh Singh	... 2	12. Ráo Kishén Singh	... 3
5. Ráo Rájá Uméd Singh	... 2	13. Ráo Búd Singh	...
6. Ráo Rájá Ajít Singh	... 1		237
7. Ráo Bhój Singh	...		
8. Ráo Rattan Singh	...		

Beyond the scene of the celebration of these barbarous rites, lies the temple of Kidārñāth, regarded with much veneration by the Hindus of the neighbourhood; it is quite devoid of architectural merit. The chief feeder of the Jāt-Sāgar, a sufficiently insignificant stream, runs, or rather drags its sluggish waters along, close to this temple, and has received the high-sounding name of the Bāngangā. Its waters are supposed by these people to possess the same cleansing virtues as those of the Ganges, and the chiefs of Būndi occasionally try its efficacy.

Next in importance to the capital is Keshorai Pātan. It is a town, however, of much more traditional celebrity than it is noteworthy for its size or commercial significance. It is a small town, situated on the northern bank of the Chambal, at an abrupt elbow which that river makes about 12 miles below Kotah; and lies a little north of $25^{\circ} 15'$ north latitude, and a little west of $77^{\circ} 0'$ east longitude. It is a Khālsah town, yielding a revenue of over Rs. 6,500, and containing barely 4,000 inhabitants, cultivating about 7,400 bighas of land with the usual kinds of produce.

Keshorai Pātan claims very ancient antiquity, local historians affecting to trace its traditions back to mythological periods.

In the present aspect of the town, however, there is little that testifies to any such great antiquity. Two ancient inscriptions alone remain as evidence of its Arabic descent. One is in a sati temple on the Brham Ghāt, which bears date Sambat 35. The other one is also preserved in an adjoining temple, and bears date Sambat 152. Long before these periods, however, and before the existence of any town at all, it is said that one Parasram built a temple there sacred to Mahādeo. This temple gradually fell into decay, but was re-built during the reign of Chatter Sāl; to whom also is due the construction of the larger temple of Keshorai, for which the town of Pātan is famous.

The foundations of this latter temple were laid during the reign of Chatter Sāl's grandfather, Mahārāj Rattanji, whose reign saw the work commenced on a scale of great magnificence, but he died before anything more than the supporting platform, which stands close on to the river-bank, had been constructed. On the accession of his grandson, the work was resumed, and the temple erected as it now stands.

Legendary traditions preserve the following account of the idol which now occupies it. The deity which it represents—Keshorai, another name for Vishnu—appeared to Chatter Sāl in a dream, and revealed to him the existence of this image of himself lying in the bed of the Chambal. To recover it, he directed him to throw some flowers into the stream, and at the place where

they should all congregate into one spot to cast a net. The injunctions of this apparition were strictly obeyed, and on drawing in the net, two stone images were discovered entangled in it. The larger of the two was at once recognized by Chatter Sál as being that of his spiritual visitor Keshorai, and was conveyed to the temple devoted to him; the other, being that of Chatarbhuja, was placed in a smaller temple adjoining. The images draw yearly a large crowd of worshippers. The temple has an endowment of Rs. 10,000 yearly from Búndi, and Rs. 3,000 from Kotah. The managers and attendants are hereditary, counting now about 300 persons, the descendants of one family.

The temple itself, though large, does not possess any marked architectural beauties, and it has been so incessantly covered with fresh coats of whitewash, that it now looks not unlike a huge piece of fretwork in wax or sugar, which the heat or moisture had partially melted.

The town is credited by local tradition with having been the scene of a successful resistance to the Muhammadans. It is said that Aurangzeb, who undoubtedly bore a serious enmity against the Búndi chief, Chatter Sál, for having sided with Dára, sent an army to destroy the Hindu temples and shrines of the country; and that this army came to Pátan, where it began to pull down and despoil the principal temple. But just as the Musalmáns were removing the golden finial, they were attacked and utterly routed by Ráo Bháo Singh, son of Chatter Sál. The original finial was never recovered, but another one has since been substituted for it.

To the north of the town, and a little removed from it, stand the remains of another edifice, bearing a somewhat romantic history. It is recorded that a warrior of great physical powers, having travelled into India from Mecca, took up his residence at Pátan, and slew a demon which greatly vexed the people, himself surviving only a day. Two hundred years later, the Emperor Ala-úd-dín is said to have caused to be built the stone platform which now marks the place, and which bears the name of the Mekka Sáhib-ka-Dargáh. At that time the environs of the town were much disturbed.

Fairs and Holy-places.—No large fairs are held in the Búndi territory. The Hindustani term “Mela” is applied to any gathering of people on occasions of festivals, &c., but these cannot come under the heading of fairs. Those that are essentially such are mentioned here.

(1) On the occasion of the Shivarátri festival (about March), a fair is held on a plain outside the city of Búndi. Besides the inhabitants of the city, there is a gathering of about 6,000

people from other States and distant places. Tradesmen from Tonk, Madhapur, Kotah, &c., all assemble and set up about 100 booths and stalls. Blankets, cloths, and other coarse cotton fabrics, brass and copper utensils, sugar, &c., are the chief articles sold. The distant traders leave after twelve days, but the local shop-keepers continue the traffic for the remaining days. The gathering for the whole month is about 40,000 people. No duty is levied on goods brought to the fair. Extension of trade may be intended, but its origin is a religious festival.

(2) In the town of Keshorai Pátan, a fair is held for four days, commencing in the month of Kártik Púnum. The occasion is a religious festival called the "Rashjattrá," as well as for bathing in the Chambal. The gathering is, however, confined to Haráoti and adjacent places. Distant traders do not attend. The total value of merchandise sold average Rs. 4,000.

Temples.—The largest temple and of any note, is the one at Keshorai Pátan, which has been mentioned already.

The State maintains the temples of Rugnáthji and the Asápurí Devi in the city. The former has a village in jágír, and maintains a suite of attendants. The chief himself worships the latter diety during the Dasera festival.

The temples of Gopál Lálji, Chatarbhuj, and Pitámburji, all in the city, belong to the State. The first has seven villages in jágír, and the second and third have allowances in cash and some land.

Four other large temples belonging to the Hindu Pantheon are supported by private individuals, besides numerous smaller ones. The Jain sect has four, supported by members of its following.

Sátor has a locally noted temple dedicated to the Rukt Duntika Devi. It is maintained partly by the Ráj and partly by private contributions.

In the romantically situated village of Khatgarh on the Mej, before it issues from the mountain-gorge into the plain, is a temple dedicated to a very old image (Singa) of Mahádeo, called Billodkeshur. It is said people from distant places come to worship here.

The village of Dagláoda possesses a temple dedicated to Lakshminarionji, noted as a very ancient place of worship, though the temple is not so old. The village belongs to the Sillore pargana.

The Kasba of Dugári has a temple of Mahádeo (Páléshar) on the embankment of the large tank. The other is an ancient image of Durga, with a new temple situated in a celebrated old garden.

The Kasba of Hindolí has three large and three small temples belonging to Hindus situated near each other in the bázár.

A Jain temple also exists here, the walls of which are painted.

The village of Bísolah has a temple situated on a hillock presided over by a Mahant of the Rámáoth Boishnuv sect, to which a jágir is attached from the State.

Each large village possesses one or two temples, but they require no particular mention.

Forts.—The arsenal of the capital lies in a gorge in the hills commanding the principal pass into Haráoti from the north, and is defended on all sides by masonry walls. Immediately overhanging it is the fort of Tárágarh. On the side of the former rises the chief's palace, tier above tier. The summit and approaches are strongly fortified and jealously guarded, none but hereditary guards and a few others being allowed to enter. There are said to be forty guns in position on the ramparts.

Ajítgarh is always talked of in Haráoti as an important fortress. In February 1871 Captain Muir obtained permission to visit it, and found it to consist of an isolated hill in the heart of a wild, mountainous country. The approaches through the outer ranges are strictly guarded, and the jungle carefully preserved. The summit is formed of a table-land two and-a-half miles long from east to west, by a mile broad, and must be of considerable altitude. The sides, naturally scarped, rise precipitously from the deep valley which surrounds it. Owing to the surface trending inwards, nothing of the top is discernible. There are two approaches—one from the east up a long spur, the other by a steep pathway on the west. Both are fortified, the entire eastern side being defended by a strong embattled wall. Towers exist at intervals, and on the open are three or four small buildings, and two artificial tanks for storing the rainfall. On each side of the entrance-gate on the west are a few buildings, in which some thirty sepoys reside. The place is simply a natural stronghold fortified, and has been used in times of national need and danger as a place of refuge, to which the families and property of the chief and his people were removed. So little is known of it, that it is spoken of as a first-class fortress, and hence is referred to.

Nainwah is a town of some consequence, thirty miles to the north-east of the capital, and is surrounded by strong old fortifications and a ditch kept in fair preservation, and flanked on its northern and western faces by large tanks, from which the fosse can be flooded at pleasure. It contains twenty pièces of sizes, chiefly of light calibre ; only a few are mounted.

Archæology.—The following places are worth mention under this head.

Near the village of Khairunak, six miles south-west of the capital, in the gorge of the Arvali, formed like an amphitheatre, are the remains of four large temples with two koonds; an inscription bears date Sambat 1320, but evidently altered from an older era to show that these temples were the work of Dewájí's time, the first Hára chief of Búndi. The place is now full of jungle. The entrance is a small opening in the hills like a gateway.

Eight miles west of Búndi, in a similar gorge, are the remains of the capital of the former Mína chiefs whom Dewájí Hára dispossessed, and it was here that they were finally overcome and slaughtered.

Twelve miles west of the capital, near the village of Gudha, are the remains of pukka buildings and a large temple, built of hewn stone, inscribed with the date Sambat 1209, and the name of a Bhíl Rájá, Sávarendra.

A mile from Gudha, near a deserted village called Khijori, are the remains of some buildings, a large cut-stone temple and three koonds, with the years Sambat 1561 and 1563 on an inscription.

Near the village of Mína-ka-Khera and Gudha, in this neighbourhood, on the top of the Arvali chain, leading through a narrow pass are the remains of a fort called Ghaairgarh, now full of jungle. This fort is said to have been captured by the Mahammadans, after an obstinate defence by the Hára Thákur, Ráwut Gudha, about the year 1589 (Sambat).

Two miles east of Lákheri are the remains of an old town named Bachálsa, captured and destroyed by one of the Pathán kings of Malwa. Below the deserted town are the remains of a large artificial lake, the embankment of which is broken. A large dilapidated mosque, built on the site, and with the materials of a Hindu temple, stands in the neighbourhood.

GAZETTEER OF DHOLPUR.*

Boundaries and Area.—Dholpur lies between $26^{\circ} 21' 20''$ and $26^{\circ} 57' 4''$ parallels of north latitude, and between $77^{\circ} 16' 15''$ and $78^{\circ} 18' 49''$ parallels of east longitude. It extends from the north-east towards the south-west over a length of 72 miles, with an average breadth of 16 miles 1 furlong. Its area is 1,174 square miles.

It is bounded on the east and north by the British district of Agra, from which it is for the most part divided by the Bángá river; on the west by the States of Kerauli and Bhartpur; and on the south by the river Chambal which separates it from the independent State of Gwalior (Central India).

Geology.—The geological accidence of the country does not present any features of peculiar interest.

An underlying ridge of red sandstone runs for over 60 miles through the State in the direction of its greatest length. It is first noticeable as a solitary hill at Pahari, a village 12 miles to the north-east of the town of Dholpur. At Dholpur it again crops to the surface, and thence it can be traced to and beyond the extreme south-western boundary of the State.

The *apparent* breadth of this ridge varies from 2 to 14 miles. It is impossible at present to estimate its *real* width; it probably underlies (though at a considerable depth) the beds of the Bángá to the north, and of the Chambal to the south, as formations similar to those in Dholpur crop up in several places in the adjoining districts of Agra, Bhartpur, and Gwalior. All the lower portions of the ridge are well stratified: the dip of the strata is generally towards the north.

The stone is most valuable for building purposes: it is fine grained, easily worked in the quarries. It hardens from exposure to the weather, and does not deteriorate by lamination. The magnificent bridge now in course of construction on the Chambal, within five miles of the town of Dholpur, for the Sindia State Railway, is being built entirely of this stone.

* Principally by Lieutenant-Colonel Dennehy, Political Agent.

Kankar (nodular limestone) is found in many places in the ravines of the Chambal, Bángangá, and other streams ; and a considerable bed of excellent limestone exists on the banks of the Chambal, within $2\frac{1}{2}$ miles of Dholpur itself, near the Agra and Bombay road.

There is no reason to believe that any coal or metallic ores are to be found in the State.

Uplands and lowlands.—Many portions of the sandstone ridge and of its lateral spurs lie considerably higher than the surrounding country. In some places, as at Pahárá, and in the immediate neighbourhood of the town of Dholpur, they assume the form of isolated hills, rising from 180 to 200 feet above the general level ; in others, as at Machchi Kúnd and Kánpur, these upheavals form considerable plateaux, almost entirely denuded of vegetation.

The highlands, due to the elevation of the underlying sandstone strata, begin within two miles to the south-east of Dholpur itself. They extend in the same direction into the Bári pargana, averaging a height above the plain of 100 feet, and covering an area of 194 square miles.

To the north of the town of Dholpur, on the other hand, an area of nine miles long by four broad lies at an average of from 10 to 20 feet below the general elevation of the country ; it was, until lately, always flooded in the rains, and later on in the cold weather. Arrangements are now made to drain this tract into the Bángangá river.

Soils.—The bed of rock is nearly everywhere throughout its entire length overlaid with a stratum of stiff yellow clay ; which again (except in a portion of the pargana of Rajakhara where the clay crops to the surface) is covered to a considerable depth with a friable alluvium.

The hollows of the ridge are also filled up with this alluvial deposit ; which, with a greater or less admixture of detritus from the sandstone itself, forms, with but few exceptions, the soil of the entire State.

Due north of Dholpur this detritus has, by the continued action of successive rains, been carried to a distance of nine miles from the parent rock ; it entirely covers the low-lying area above spoken of, which lies in the direction of the greatest flow of surface-water.

The soil is everywhere poor on the sandstone ridge and in its immediate vicinity ; but it becomes richer and more fertile in proportion to the increase of distance from the ridge, and of immunity from the deteriorating admixture of detritus yearly washed into it.

The "Domat," or mixture of sand and clay, which covers the parganas of Baseri, Kolari, and the portions of Bári and Rajakhera farthest from this influence, is fully equal in productiveness to the best land in the Agra district.

In the Rajakhera pargana, 15 miles north-east of the town of Dholpur, an area of about 90 square miles is covered with black soil similar to that of Bundelkhand, producing excellent cold-weather crops.

Elevation.—The elevation above the level of the sea on the ridge varies from 560 to 1,074 feet. The elevation of the rest of the country varies from 500 to 700 feet ; that of Dholpur itself is 570 feet.

Rivers.—The principal rivers of Dholpur are the Chambal, the Bángangá (or Utangun), the Parbati, the Merka, and the Merki.

The Chambal flows from south-west to north-east along a course of over 100 miles through Dholpur territory ; it forms the southern boundary of the State, which it divides from Gwalior. In the dry weather it is a sluggish stream 300 yards wide and 170 feet below the level of the surrounding country. In the rains it rises generally about 70 feet, and in extreme floods 97 feet, above its summer level ; its breadth is then increased to over 1,000 yards, and it runs at the rate of $5\frac{1}{2}$ miles an hour. It is bordered everywhere by a labyrinth of ravines (some of which are 90 feet deep), which run back inland from the river's bank to a distance of from two to four miles.

The difficulties of navigation of the Chambal, and its rapid changes of level, render it useless for water-carriage. Boats ply at sixteen gháts between the Dholpur and Gwalior banks. The most important crossing is that at Rajghát, three miles south of Dholpur itself, on the high road between Agra and Bombay. A bridge of boats is here kept up between the 1st of November and the 15th June, and a large ferry-boat plies during the rest of the year.

No tributaries fall into the Chambal during its course through Dholpur territory.

The watershed of the sandstone ridge, described above, runs parallel to the river at an average distance of three miles, so that only the narrow strip of intervening country drains into the Chambal. The drainage of the far larger area to north of the ridge goes to the Bángangá, the Parbati, the Merka, and the Merki.

The Bángangá, or Utangun, rises in the hills near Bairat in Jaipur ; whence it runs westward, traverses the Bhartpur territory, and then runs for about 40 miles between the northern boundary of Dholpur and the British district of Agra. After

leaving the Dholpur State it falls into the Jumna. Its bed is about 40 feet below the surrounding country. It is a mere thread of water in the dry season, but is liable to floods in the rains, with a rise of from 17 to 20 feet. On either bank ravines run inland, sometimes two miles or more.

The Parbati rises in Kerauli, not far from the Dholpur border; and taking a sinuous course through Dholpur north-eastward for over 60 miles, it falls into the Bángangá in the Agra district.

The Merka and Merki rise on the north of the sandstone ridge within the State; they each run northwards for about 18 or 20 miles, and fall into the Parbati.

The Merka, the Merki, and the Parbati dry up in the hot season, leaving only occasional pools where the channels are deep.

The soil nearly everywhere throughout the State consisting, as before stated, of a friable alluvium, the beds of all these rivers are considerably below the general level of the country, and the banks of all are more or less cut up and fringed with ravines.

Climate and Rainfall.—The climate is generally healthy; the hot winds blow steadily and strongly during the months of April, May, and June. The rainfall averages from 27 to 30 inches.

History.—According to local tradition, Dholpur derives its name from Rájá Dholun Dev Tonwár (an offshoot of the family reigning at Delhi), who about A.D. 1005 held the country between the Chambal and Bángangá rivers, and resided at Belpur on the Chambal, 10 miles south-west of the present town of Dholpur.

It is stated that Rájá Dholun Dev built in the ravines of the Chambal the old fort which still exists, though in a ruinous condition; and the spot acquired sanctity and good omen from the lucky discovery of a "lingam" of Mahadeo on the site. This lingam was duly worshipped up to the year 1868 A.D., when it was washed away with its temple by a flood of the Chambal.

It is most probable that the strip of country which now makes up the State was a part of the kingdom of Kanoj, which, under the Ráthors, certainly extended westward for some distance along the Chambal in this direction, and must have included the open country. The Kerauli Jádons claim to have built a fort at Dholpur in A.D. 1120, and the clan may have occupied temporarily some lands in these parts; but they could have had no permanent territory so far east. When Shaháb-ud-din overthrew the Kanoj kingdom in 1194, he and his generals took the forts of Biána and Gwalior, which command all this part of the country. From this time up to the date of Bábar's invasion, there

must have been much fighting along the Chambal, and the forts were taken and re-taken in the struggles and insurrections that went on, especially with the Tonwár Rájputs beyond the river, who held Gwalior during the greater part of the fifteenth century.

About 1490 A.D. Rájá Mán Singh of Gwalior succeeded in expelling the Musalmán governor from Dholpur, and retained possession for several years; while the Tonwárs were again driven out by the Emperor Sikandar Lodi. On the whole, we may conclude that this tract, which is quite open and accessible from the east, was from early times incorporated with Musalmán conquests.

The victory of Bábar at Fathepur Síkrí gave all this country to the Mughals, though Dholpur held out for a short time; and under Akbár these lands belonged to the Subah of Agra. The town was the residence of imperial governors, of whom several monuments are left in the buildings which they added. Sádiq Muhammad Khán built a good deal in Akbár's time, and Nawabs Fathullah Khán and Mahábat Khán, who governed Dholpur during the reign of Shahjahán, built, the first, a new quarter of the city, and the latter, an outlying suburb, which were called after them "Fathábád" and "Mahábatnagar," respectively. In October 1628 Khán Jahán Khán rebelled against the Emperor Shahjahán, and with 2,000 Afghan horse fled from Agra to his government of the Dakhan. Overtaken at the Chambal, near Dholpur, by the imperial troops, he made a gallant stand to secure the passage of his family, and after leading a final charge on his pursuers, he plunged his horse into the river and swam to the Gwalior bank, losing only a few men and horses swept away by the current.

Thirty years later the battle for empire between the sons of Shahjahán was fought at Ranka Chabutra, three miles to the east of Dholpur. Here the Princes Aurangzeb and Murád overthrew their brother Dára Sheko, and here the gallant Ráo Ram Singh of Búndi was slain.

Again, after the death of Aurangzeb, the final struggle for supreme power between his sons, Ázam and Muazzam, was fought out in 1707 within this territory, near the village of Barehta, where Ázam was killed.

Soon after this, Rájá Kalian Singh Bhadauriya, taking advantage of the troubles which beset the emperor on all sides, obtained possession of the Dholpur parganas.

The Bhadauriyas remained undisturbed until 1761, when the Ját Rájá Súraj Mal, of Bharthpur, after the battle of Pánipat, seized upon Agra and overran the Dholpur country to the Chambal.

During the succeeding forty-five years Dholpur changed masters no less than five times.

In 1775 it shared the fate of the rest of the Bhartpur possessions, which were appropriated by Mirza Najaf Khán. At the death of Mirza, in 1782, it fell into the hands of Sindia. On the outbreak of the Maratha war in 1803 it was occupied by the British, by whom it was, in accordance with the treaty of Sirji Anjengaum, at the end of the same year again ceded to the Gwalior chief. In 1805, under fresh arrangements with Daulat Ráo Sindia, it was resumed by the English; who finally, in 1806, uniting the parganas of Dholpur, Bári, and Rajakhera with the taluqa of Sir Muttra into one State, made it over as a possession to Mahárájá Rana Kirat Singh (the ancestor of the present Rana of Dholpur), in exchange for his territory of Gohad, which was abandoned by Sindia.

Name, age, caste, family name, and other personal particulars of the ruling Chiefs.—The present ruler of the Dholpur State, the fourth in descent from Maháráj Rana Kirat Singh, is His Highness the Maháráj Rana Nehal Singh, a Ját of the Bamraulia family, born in 1868. He succeeded to the *gadi* on the death of his grandfather, Maharana Bhagwant Singh, in 1873. His official designation is Rais-ud-daula Supador-ul-Mulk, Maharaj Dheraj Sri Sewái Rana Nehál Singh, Lokinder Bahadur Diler Jung.

The father of the Rana Nehál Singh never came to the chiefship; he died during the life-time of his father, Maharana Bhagwant Singh.

The family of the ruling chief belongs to the Deswali tribe of Játs, and traces a pedigree back to one Jeth Singh, who is supposed to have got lands for himself about Bairat, to the south of Alwar, in the eleventh century. He is said to have risen to honour under the Tonwár kings of Delhi; and after the fall of that dynasty, one of his descendants is said to have settled on the lands of Bamroli, whence the family name. At Bamroli the family is recorded to have remained for 172 years, but Ratan Pal Bamraulia came to misfortune during the reign of Firuz-ud-din Tughlak, and about the year 1367 A.D. was driven from his strongholds by Manir Muhammad, Subahdar of Agra. He left Bamroli, and with his followers crossed the Chambal into Gwalior, where the perpetual border warfare between Gwalior Rájputs and the lieutenants of the King of Delhi offered chances for adventurers, and he joined the Rájputs.

In this alliance the Bamroli family appears to have prospered as devoted adherents to the Rájput Rájás of Gwalior, and as distinguished soldiers in the wars against Musalmáns.

They eventually settled at Bāgtharmā, near Gohad, where the head of their house still further strengthened his position by a marriage with the daughter of the Bissauntya Ját Thákur. And Singan Deo, fifth in descent from Ratan Pal, obtained, as a reward for great services in an expedition to the Dakhan, a formal grant from Rájá Mán Singh Tonwár, of Gwalior, of the territory of Gohad, whence he assumed his title of Rana. This is said to have occurred in 1505 A.D. ; and the Emperor Sikandar Lodi is asserted to have conferred on the Rana a *mansab*, or imperial title of honour, confirming his possessions and recognizing his title. In this manner, at first by their attachment to the Tonwár Rájás of Gwalior, and afterwards by adroit management of their affairs under the Mughal empire, and during the Maratha incursions of the eighteenth century, the Ját Ranas of Gohad seem to have maintained their footing with varying fortunes until the British appeared in Northern India. They appear to have been connected with the Peshwa Baji Rao ; and in 1761, when the Marathas had been completely defeated at Pánipat, Rana Bhim Singh seized the important fortress of Gwalior. Then Sindia came on the scene, and besieged Gwalior in 1767 unsuccessfully, though he succeeded in taking it from the Rana in 1777. In order to form a barrier against the encroachments of the Marathas, Warren Hastings made a treaty with the Rana in 1779, and in execution of this treaty the joint forces of the English and the Rana retook Gwalior. In 1781 another treaty was stipulated for the integrity of the Gohad territories ; but afterwards this stipulation was withdrawn, and Sindia repossessed himself of Gohad and Gwalior in 1783. The Rana himself surrendered, but lost all his dominions, and went into exile until Lord Wellesley's policy against the Maratha confederacy brought him forward again in 1803. Under the British treaty of 1803 with Sindia, and 1804 with Ambaji Ingolia, the Rana recovered certain districts ; but in 1805 another treaty was concluded by which he lost Gwalior and Gohad, and the parganas of Dholpur, Bári, and Rajakhera were finally assigned to the Rana of Dholpur. These lands now constitute his State.

The Rana is entitled to a salute of 15 guns.

Relatives and connections of the Chief.—The relatives of the Maháráj Rana include representatives of seven families, or, with that of the Rana himself, eight families, known as the "Athghar."

The Rana is alone in the "Gadi-ka-ghar," or ruling house.

The other seven families branched off from the parent stem many generations back : all are descended from the four sons of

Maháráj Bhagraj, the ancestor in the eighth generation of the present Rana, who occupied the *gadi* about A.D. 1665, and was then the sole representative of the "Bamraulia" house, who had issue.

From his eldest son, Rana Gaj Singh, are descended :—

I.—The "Gadí" (or reigning family), represented by the present Maháráj Rana.

II.—The "Ekayuna" family, represented by Kunwar Surjan Singh.

III.—The "Pachgaon" family, represented by Kunwar Kheri Singh.

IV.—The "Makoi" family, represented by Ráo Ranjit Singh and Kunwar Dalip Singh.

V.—The "Rajpura" family, of which no legitimate descendants are left.

From Sham Singh, the second son of Maháráj Bhagraj, come :—

VI.—The "Sur Kythoda" family, of which Kunwars Jarrias Singh, Bhagwant Singh, and Girwar Singh.

From Badan Singh, third son of Maháráj Bhagraj, come :—

VII.—The "Bhagwasi" family, of which Kunwar Bhairon Singh.

From Anup Singh, fourth son of Maháráj Bhagraj :—

VIII.—The "Dandrowa" family, represented by Kunwar Hardeo Singh, Kunwar Ratan Singh, and Kunwar Chumaji.

The names mentioned are only those of the heads of different branches of families in possession of separate properties and *jágírs*: the total number of the male descendants of Maháráj Bhag Singh is over thirty.

For the last 370 years there have been only three adoptions in the reigning branch; all have taken place subsequent to Maháráj Rana Bhagraj, and all were from the "Pachgaon" family (No. III).

The "Dandrowa" branch (No. VIII) has for several generations occupied a high position in wealth and importance.

The representatives of these seven families now take rank in the State only as connections of the chief.

Form of Government.—The State is at present administered, during the minority of the chief, by a Council of Management of four members under the supervision of a British officer.

The Council of Management consists of Kunwar Hardeo Singh of the Dandrowa family, Thákur Bechu Singh, in special charge of the land revenue, and Lala Sundar Lál, whose family have been for several generations *vakíls* of the State.

The fourth place is vacant, the first member and one of the principal Sirdars of the State having lately died.

This Council has the supreme direction of affairs. From them emanate all orders involving payments from the treasury, whether for ordinary or extraordinary expenditure; punishments, dismissals, appointments, and promotions of State servants; settlements of claims for the transfer of land, and other final orders in the revenue department; criminal cases necessitating a punishment more severe than imprisonment for three years, and generally all important cases in every department.

Orders in the military, household, and treasury establishments are given by the Council direct to the officers concerned. Land-revenue is managed through the deputy collector and tahsildars; customs and indirect revenue through the superintendent of customs; civil and criminal justice and police through the principal judge of the State. Appeals from all orders of officers of the State in every department are heard by the Council, provided the appeal be presented within two months.

Dominant Classes.—Ráo Madan Singh, Ráo of Sir Muttra, occupies the first position in the State; he is a Kerauli Jádón descended from Mukat Ráo, second son of Rájá Gopál Das of Kerauli. Ráo Mukat Ráo settled in Sir Muttra in A.D. 1570.

The present Ráo Madan Singh is fifteenth in descent from Mukat Rao; he has a son seven years old.

The taluqa of Sir Muttra is situated in the extreme south-west portion of the State; it comprises 32 villages, with an area of 175 square miles, of which one-fifth only is culturable, the rest is a waste of rocks and ravines.

The Ráo is allowed to manage his own estate under the general control of the Dholpur Darbár, to which he pays an annual quit-rent of Rs. 20,000, with a fine on the investiture of a new Ráo of Rs. 10,000. In 1828 Ráo Manohar Singh, and again in 1850 his son Ráo Baldeo Singh, grandfather of the present Ráo, refused to carry out their obligations to the Dholpur Darbár; on each occasion they were, after a stubborn fight, reduced to submission by troops sent from Dholpur.

The relations of Ráo Madan Singh with the Darbár are satisfactory.

Rijouni and Bilouni.—Thákur Dalel Singh of Rijouni, and Durjan Singh and Zálím Singh, zamindars of Bilouni, both near the Sir Muttra border, are Jádóns of the Sir Muttra family.

The first pays the State a head-rent of Rs. 1,660. Difficulties have also from time to time arisen between these Thakúrs and the Darbár on account of their contumacy. Both Rijouni and Biloun

were for some years sequestrated; since 1863, however, they have given no trouble.

Among the Játs outside the immediate family of His Highness, the most important are the Bidankria family, descended from three cousins—Kanhaiya Lal, Ratti Ram, and Hindupat—who were entrusted by the late Maharana with the management of the affairs of the State as Diwán, Fáujdár, and Rajdhar, respectively—the first in A.D. 1836, and the two others in 1839.

Ráo Balwant Singh, grandson of Hindupat, resides at Dholpur.

Hakims Abas Husen and Mir Achu are great-grandsons of Babár Ali, a famous hakim in the beginning of this century in the service of Maharana Kirat Singh. A considerable jágír still remains in the hands of these hakims.

Mansabdar Mangal Khán of Kiré, and Haji Ahmađ Khan of Gumat, are the oldest Muhammadan jágírdárs of the State; they reside at Bári.

The ancestor of Mangal Khán, Bázyd Khan, first settled at Bári in the reign of Shahjahán. His great-grandson, Aím Khan, distinguished himself in the service of the Emperor Muhammad Shah, from whom he obtained in A.D. 1721 a *mansab*, or title of honour, of a Chárházári.

The descendants of Mirza Khán also received the titles of honour of “Dilázáq” and “Házári Khán” for military services under Muhammad Shah.

Among the principal officials of the State, those who have longest held office by hereditary descent are the following:—

Gopal Singh Sirautia, Sinauria Bráhmaṇ, now a jágírdár of the State, and employed in the sillehdar troops, whose ancestor Manrup Singh took service from Rana Singan Deo in A.D. 1507.

Dinanáth Ahir, in charge of the Khasgi establishments; his ancestor Paresráṁ was first appointed to the post in A.D. 1674 by Maharana Gaj Singh.

Rai Chote Lál, a Sribastak Káyath, one of the head auditors of revenue accounts, whose ancestor was appointed by Rana Jeswant Singh in A.D. 1734.

The ancestor of Lal Súraj Mal, another of the head auditors of revenue accounts, came to the State under Rana Bhim Singh about 1740.

Administrative Sub-divisions.—For fiscal purposes the State is divided into the following five tahsils, which again are sub-divided into nineteen taluqas:—

I.—Tahsil Gird Dholpur, including the villages immediately about Dholpur itself as well as the tract stretching north-east along the Agra road,—five taluqas, viz., Gird 43 villages, Chaoni

29 villages, Dang 15 villages, Mania 38 villages, Mangral 13 villages—total 139 villages.

II.—Tahsil Bári, including all the south-western portion of the district—seven taluqas, *viz.*, Sir Muttra 32 villages, Rijauni 7 villages, Bári 71 villages, Sikarra 17 villages, Umreh 28 villages, Dang 13 villages, Bilauni 9 villages—total 177 villages.

III.—Tahsil Baseri, situated to the north-west of Dholpur—two taluqas, *viz.*, Baseri 26 villages, Angai 24 villages—total 50 villages.

IV.—Tahsil Kolari, situated to the north of Dholpur—three taluqas, *viz.*, Kolari 42 villages, Básai 14 villages, Sahpan 11 villages—total 67 villages.

V.—Tahsil Rajakhera, situated to the north-east of Dholpur—two taluqas, *viz.*, Rajakhera 60 villages, Rahna 37 villages—total 97 villages.

Besides the above, the village of Nimraul in Gwalior territory is held by this Darbár, to whom the revenue returns are sent direct.

The total number of villages in the State is 531. The administration of the land-revenue is under a tahsildár for each tahsil; there is besides a naib tahsildár in Gird for taluqas Mania and Mangral, and one in Rajakhera for taluqa Rahna. The tahsildárs are subordinate to the deputy collector.

Copies of records, accounts, and statistics regarding each pargana are kept by the kánungos as well as at the tahsili: village accounts are kept by a patwári at each village. Both offices are hereditary.

The arrangements for the collection of customs and indirect revenue are co-ordinate with those for land-revenue. They are under the general supervision of the superintendent of customs, who has a deputy superintendent in each tahsil. Seventy-five collection stations are distributed over the State; to each is attached a group of villages, and in each the duty on articles in transit and on sales is collected. The right to manufacture and sell spirituous liquors and drugs is let out on contract direct by the Darbár.

A small forest department is employed in each pargana under the tahsildár, which manages the woodlands by a system of regular cutting and felling.

Principal Crops.—The area under *kharíf*, or rain crops, in Dholpur is in excess of that under *rabi*, or spring crops, being about 187,182 acres of the former to 123,100 of the latter, which includes 37,257 acres of “dofasli” land, from which one *kharíf* and one *rabi* crop are taken in the year.

In the *kharíf* the grains most commonly grown are :—

Jowár (*Holcus sorgum*, Linn.), 69,000 acres, of which the greater portion in parganas Bári and Gird.

Môt (*Phaseolus aconitifolius*, Jacq.), 40,000 acres, of which the largest proportion in Bári.

Bájrâ (*Holcus spicatus*, Linn.), 27,500 acres, principally in Rajakhera and Bári.

Cotton, 23,000 acres, of which most in Bári, in Rajakhera, and in Baseri.

Of sugarcane only 2,690 acres are grown in the State, principally in Bári and Baseri.

Rice is cultivated only to the extent of 3,456 acres, principally in taluqa Sir Muttra.

Three hundred and forty acres of tobacco are produced in Bári and 532 in the entire State. The leaf of the Dholpur tobacco is considered of superior quality.

In the rabi or cold-weather sowings the proportion of gram is the largest, being about 65,130 acres : the largest sowings are in Bári and in Rajakhera.

Twenty-four thousand two hundred and forty acres of wheat are grown, of which 7,100 in Bári, 5,700 in Gird, and 4,800 in Kolari. It is less grown in Baseri and Rajakhera.

Barley mixed with sarson is sown to the extent of 15,800 acres, principally in Gird and in Rajakhera.

Barley unmixed with any other grain is grown in 13,700 acres, pretty equally divided through each pargana.

Arhâr (*Cajanus Indicus*, Spreng.) is not a favorite crop ; the sub-soil being generally porous, the water drains off quickly and leaves the plant more exposed to the attacks of frost, from which it suffers severely. Only 2,648 acres of arhâr is grown, principally in Kolari.

Three hundred and twenty acres of land are under poppy cultivation : 100 acres in pargana Baseri, 212 in taluqa Sir Muttra, and 8 in taluqa Rijouni (pargana Bári).

Zirá or Jirá (*Cuminum cyminum*, Linn.—cummin-seed) is grown in 606 acres, principally in Gird.

All the above calculations are based on the rough and untested records of the survey of the State made in 1875-76. The statistics are in the main exact, but are subject to a certain variation in different years.

The amount of land brought under cultivation is now yearly increasing.

Cost of production.—The cost of production of ordinary crops consists of the following items, in which calculations are based on the supposition that all articles required for the cultivation of one acre are purchased, and all labour paid for at the average market value and rate.

Ploughing.—For jowár, mixed with mung (*Phaseolus mungo*, Linn.), til (*Sesamum Indicum*, Linn.), &c., bájrâ, mung, cotton, and mô't, two light ploughings are sufficient; the cost of wages for this would average Re. 1-8 per acre.

In some villages, in addition to what is grown on ploughed lands, poor crops of bájrâ, jowár, and mô't are produced by merely scratching the surface of the soil with bill-hooks and "furwabs," and then sowing the seed. About 6 per cent. of the rain crops are produced in this way. For rice and gram four ploughings are required, costing Rs. 3; for wheat and barley, six ploughings, costing Rs. 4-8.

Manure of the ordinary crops.—Wheat and barley only are manured; the cost is about Re. 1-6 per acre; for cotton it is 11 annas only.

Price of seed.—The amount and price of seed per acre varies from 9 seers of bájrâ and jowár, costing Rs. 0-5-6, to 1 maund of rice, costing Rs. 2, and 1 maund and 5 seers of wheat and barley, costing respectively Rs. 2-4 and Re. 1-12.

Weeding.—Cotton is weeded three times, at a cost of Rs. 3-12 per acre; jowár and bájrâ twice, at a cost of Rs. 1-6; wheat and barley once, at a cost of 8 annas. Coolies are generally paid for weeding 1 anna a day each.

Irrigation.—Of the more ordinary crops only, wheat, barley, and gram are irrigated, at a cost of Rs. 10, Rs. 5, and Rs. 2-8 respectively. Gram is either unirrigated, or irrigated once only. Cotton is generally unirrigated.

Watching crops.—When nearly ripe, jowár, bájrâ, and gram crops cost about 8 annas an acre for "rakhwâri."

Reaping.—For jowár, bájrâ, and mô't, labourers receive per day from 2 annas to 2 annas 3 pies each, or five seers of grain. The cost for one acre of jowár and bájrâ of 8 coolies would be Re. 1-2; for mô't 12 coolies, costing Re. 1-8.

Reapers are paid for wheat, barley, and gram at the rate of $1\frac{3}{4}$ seers of the former and 3 seers of the latter, or in cash 1 anna 6 pie per day each, at a cost per acre of Re. 1-5; 102 coolies at one anna each, costing Rs. 6-6, are required to pick an acre of cotton.

Threshing for jowár and bájrâ costs Re. 1-3-9, and for gram, wheat, and barley Re. 1-12.

Wear and tear of instruments of husbandry is estimated for irrigated crops at 10 per cent. of the total cost of production; on account of wear and tear of ropes, leather buckets, &c.; for unirrigated crops, it is estimated merely at a nominal sum.

Rent paid to Zamindar, including State demand, for jowár, bájrâ, mô't, and gram is per acre Rs. 6, for wheat and barley Rs. 9,

for cotton, sugarcane, and poppy Rs. 11-4, zírâ and tobacco Rs. 7, and rice, mung, and mô't Rs. 5-10, Rs. 5-1, and Rs. 4, respectively.

The total cost of production per acre would thus be: for jowâr and bájrá about Rs. 12-5, for mô't Rs. 9-12-9, cotton Rs. 25-3, wheat Rs. 33-12, barléy Rs. 27-11-6, gram Rs. 12-14-6.

The outturn of an acre of jowâr mixed with mung, tîl, &c., would be about 15 maunds 12 seers, British Indian weight, of the different grains, which, with *karb* and *bhúsâ*, should sell for Rs. 20. Thus, after defraying all costs of expenditure, this should leave in the hands of the cultivator a net profit of Rs. 7-11 per acre. The outturn of bájrá mixed with other grains would be 10 maunds of bájrá and 5 maunds and 12 seers of other grains, the whole selling for Rs. 19-8; thus leaving a margin of Rs. 7-3.

An acre of cotton (usually mixed with urîd, tîl, arhâr, and *san*—*Crotalaria juncea*, Linn., or Indian hemp) would produce 8 maunds of cotton, which, at 12 seers per rupee, would sell for Rs. 26-10-9, and six maunds of other grain, which, with the *bhúsâ*, &c., would sell for Rs. 8-10-9. The total value of the crop would be Rs. 35-5-6, from which, if we deduct the cost of production, Rs. 25, a profit of Rs. 10-5-6 will be left to the cultivator.

Mô't is not sown with a mixture of other grains: an average acre will produce 10 maunds, which will sell for Rs. 10, and 8 maunds of *bhúsâ*, selling for Rs. 2; total Rs. 12, leaving a profit of Rs. 2-3-3.

The cost of production of rice is Rs. 17 per acre; the value of the crop, 15 maunds selling at 25 seers per rupee, Rs. 24, and straw 7 annas; total Rs. 24-7: profit Rs. 7-7 per acre.

Sugarcane.—The cost of production is Rs. 83; the value of 40 maunds 20 seers of rab, at 13 seers 8 chatâks per rupee, is Rs. 120, and the balance of profit Rs. 37.

Wheat.—The cost of production is Rs. 33-12 per acre; the value of crop, 25 maunds wheat, at 25 seers per rupee, Rs. 32; value of 2 maunds 20 seers of sarson, at 20 seers per rupee, Rs. 5; value of 20 maunds of *bhúsâ*, at 5 maunds per rupee, Rs. 4; total Rs. 41; and the balance of profit is Rs. 7-4.

For barley the cost of production is Rs. 27-11-6, the value of crop, Rs. 33-13, and consequent profit Rs. 6-1-6.

Gram, unirrigated.—The cost of production is Rs. 12-14-6, and of gram, irrigated, Rs. 19-0-6: the value of the crop is, for the first, Rs. 18, and Rs. 25-8 for the second; the profit in the two cases being Rs. 5-1-6 and Rs. 6-7-6, respectively.

Zírâ (cummin-seed, a spice commanding a ready sale).—The cost of production is Rs. 22-3; the value of the crop Rs. 32, and the profit Rs. 9-13. This crop is a precarious one.

Tobacco.—The cost of production is Rs. 27-9-6, the value of crop Rs. 34-4-6; the profit Rs. 6-11.

Poppy.—The cost of production is Rs. 61-14-6, the value of the crop Rs. 106-5-3, and the profit Rs. 44-6-9.

Taking into consideration the amount of capital required to be expended in production, the most profitable of the ordinary rain crops are jowár and bájrâ, mixed with mung, tîl, &c.

Next to them come rice and cotton.

Of the rabi crops, gram, according to this view, is the most profitable to the cultivator, after which would come barley and wheat. It must be remembered that, as a fact, the members of agricultural families to a large extent themselves work in the field, and that thus the cost of much labour is saved, and the profits of cultivation considerably enhanced in consequence; and, in point of fact, in the instances of most of the ordinary crops, the profits would be at least one-third more than I have stated.

Agriculture.—In the highlands on the banks of the Chambal, Bángangá, and Parbati, rain crops are exclusively grown: the land is poor, and irrigation is impossible.

In the rest of the State the cultivation in each season is about equal.

Over the *total* area, if we take the amount of land cultivated in the kharíf as one, that taken up for rabi crops would be two-thirds.

The only three divisions of the soil recognized by the people are,—“goínd,” or the land immediately around the village; “manjha,” the belt beyond that; and “har,” the outlying cultivated fields. The proportion which these three kinds of land bear to the cultivated area of the State is about 13 per cent., 22 per cent., and 65 per cent., respectively.

The most carefully tilled villages are to be found in the Baseri, Kolari, and Bári parganas, among the Mainas, the Ponwárs, and Jádon Thákurs, and the Golapurab Bráhmans; the worst are in Rajakhera and Gird, among the Tonwár and Mori Thákurs: these people are bad zamindars and worse cultivators. In the latter parganas, too, many villages are under-populated; they suffered more severely than their neighbours in the famine of 1868-69. Some of the inhabitants died, and many left their homes with their families to seek for employment and food elsewhere. The Darbár is now making every effort to attract cultivators to these villages by the reduction of the revenue demand, the institution of a liberal system of “takávi” advances, and by increased means of irrigation: the process, however, is necessarily slow.

The greater portion of the culturable but uncultivated land has been lying fallow since the famine of 1868-69 ; none of it is first-class land ; but, as the population makes year by year further approaches to its normal standard, this fallow-land is being again gradually broken up. The drainage-works, too, in pargana Gird are rescuing some excellent land from the annual floods and rendering it available for cultivation.

Land-Revenue.—The land-revenue of the State is about Rs. 9,22,355. It is collected yearly in four instalments : in October 5 annas and in December 5 annas, making 10 annas in the rupee, are collected for the kharíf or rain crops ; in March 3 annas and in April 3 annas, making the remaining 6 annas in the rupee, are demanded for the rabi or cold-weather crops.

The total demand is not high, but it presses unequally on villages. The land had not until 1875 been surveyed since 1570, in the reign of the Emperor Akbár, and there were absolutely no records, even approximately correct, as to the areas of villages in the present day.

A survey, preparatory to a re-settlement of the land, was commenced towards the end of October 1875 : it was completed in the beginning of July 1876.

A regular settlement for twelve years is now in progress, on a basis similar to those of the North-Western Provinces, but simpler in its details.

Out of its land-paying revenue, including the quit-rent from Sir Muttra and Rijouni, the State receives only about Rs. 7,20,637 annually.

Lands of an annual estimated revenue of Rs. 1,04,567 and Rs. 97,151 have been given away in jágír and muáfí respectively, principally by the late Rana Bhagwant Singh.

This does not include the annual money payment of Rs. 36,000 to muáfídar, disbursed in cash from the treasury. The total assets thus alienated from the State amount to Rs. 2,37,718.

Land Tenures.—The land tenures are : pattidari or “ Phátwar,” of which there are 384 villages, and zamindari, that is, without holdings separately assessed, 146 villages.

The conditions of these tenures are in most respects similar to those in the North-Western Provinces ; with this important exception, that in Dholpur, as under other Native Governments, the Rana is the absolute owner of the land. The zamindars, or lambardárs as they are more usually termed, are persons (generally descendants of the original founders of the village) who contract with the State for the payment of the revenue demand, which they collect from the cultivators, who are either members of their own body or tenants under them.

They are, as long as they observe their contract, considered as owners of the land actually cultivated by them and by their tenants, and of uncultivated land, if there is any in the village, sufficient for the grazing of the village cattle.

All the rest of the uncultivated land, with its produce, sarpat grass (*sarpat*,—*sacharum procerum*, Linn.), groves, tanks, &c., belongs to the State; all dry or fallen trees are likewise the property of the State.

Lambardárs can sell or mortgage their rights. Sales are almost unknown: mortgages of frequent occurrence.

Lambardárs are entitled to receive 5 per cent. of the State revenue as “*mukaduami*” for the cost of collection. Certain lambardárs in 210 villages are further permitted to realize a rent charge, “*nánkár*,” varying from Rs. 15 to Rs. 775 per annum, on the assets of their village. This *nánkár* was originally given either on condition of the recipient rendering certain services to the State, such as the watch and protection of a ghát, or a disturbed border locality, or with a view to deciding the more powerful Thákurs to throw their influence on the side of the State and assist in effecting the collection of the revenue.

The total amount of *nánkár* is Rs. 29,134.

Of the pattedári villages, 205 are Bhayachara; of these, 38 belong to Gujar communities, 22 to Golapurah Bráhmans, 31 to Tonwár and Ponwár Rájputés, 91 to Lodhas; Sikarwars and Játs have 11 each, the rest are in the hands of Bráhmans, Máinas, Kachhis, &c.

In some, the sub-division of Thokes Pháuts have become so numerous and minute, that there is barely sufficient left to each proprietor of a separate share to feed himself and his family, and to acquit his liability to the State demand.

In the Ponwár villages of Sikarra Rawatpati in Bári, and of Pipraun in the Baseri pargana, there are 150 and 100 co-sharers respectively, and in the Rájput village of Rajakhera *khás* there are 164 co-sharers; in such villages there is scarcely any separate cultivating class; each of the smaller sharers himself cultivates the land he owns.

Ordinary cultivators have occupancy but no proprietary rights. Pabi Kasht cultivation is not usual: it is generally to be found in under-populated villages where good land is vacant and cannot be taken up in the village itself.

The Ráo of Sir Muttra and the Thákur of Rijouni hold their 39 villages from the Rana at a quit-rent. The State has not renounced its right to enhance the tanka or quit-rent collected from them, but practically it is not enhanced as long as the taluqdárs adhere to their agreements with the Dholpur Darbár.

All the villages of these taluqas are held from the taluqdars in zamindari "Gol" tenure. The land is not divided among several owners.

Of the 530 villages in the State, 57, with a total area of 40,246 acres, are in possession of jágírdárs who, in return, are expected themselves to serve in the State troops, and to furnish a certain number of horsemen for the State service.

Nine thousand five hundred and forty-four acres in smaller amounts distributed over the khálsa villages, have further been from time to time granted to less important jágírdárs on the same condition.

Forty-four villages, with an area of 26,182 acres, besides portion of other villages, aggregating 20,063 acres, have been given to muáfídar, principally for religious purposes.

The State exercises the right of interference in cases of oppression or exaction on the part of jágírdárs or muáfídar.

Proprietary and Cultivating Classes.—Two hundred and twenty-five villages are possessed by Rájput lambardárs, viz., Ponwárs 103, Jádús 49, Bargujar 25, Sikarwárs 23, Tonwárs 15, Tagargari 6, Mori 3, and Purhiars 1.

In 51 villages the lambardárs are Sanád Bráhmans, in 95 Gújars, in 45 Lodhas, in 32 Játs, in 13 Mainas; the remaining 15 villages are divided between Kachhis, Kirars (Ahir), and Muhammadans.

Among the cultivators the most numerous are: 1st, Bráhmans, who number nearly 27,000, cultivating 43,500 acres of land; 2nd, Thákurs, 21,000 of whom cultivate 56,000 acres; 3rd, 18,000 Chamárs, cultivating 19,600 acres; 4th, Gújars, numbering 15,700, who cultivate 34,500 acres; 5th, Kachhis, 13,000, cultivating 19,300 acres; 6th, 10,000 Mainas, cultivating nearly 20,000 acres; 7th, Lodhas 60,700, cultivating nearly 13,000 acres; 8th, Golapúrah 5,200, cultivating nearly 17,000 acres.

The remaining 50,170 acres are cultivated by 21,944 persons belonging to 62 of the inferior castes.

The average quantity of land tilled by each individual of the cultivating classes in the State, is a fraction under two acres.

Amongst the proprietary class the Gújars were, according to local tradition, among the oldest known inhabitants of the country; they are generally located along the banks of the Chambal, in the Dáng, or ravine, taluqas of parganas Bári and Gird. They are great cattle-lifters. Severe repressive measures have partially converted them into agriculturists.

The Mainas are among the oldest inhabitants of Bári and Baseri; they are believed originally to have come from Jaipur. They are among the best zamindars and cultivators of the State.

The Tonwárs are spoken of as the first Thákur occupants of the country; they would appear to have had a footing here and a Gwalior in the beginning of the eleventh century, while the chief of their clan was still reigning at Delhi. They are located principally in the Rahna taluqa in the Rajakhera tahsil.

The first of the Ponwár Thákurs who came to Dholpur is stated to be Lakhan Singh, who towards the close of the twelfth century emigrated from Ujain. He married a daughter of the Jádón house of Kerauli, and established himself in pargana Baseri.

The direct descendants of Lakhan Singh in the present day are Thákurs Ranjit Singh and Deo Singh, who are zamindars of five of the Ponwár villages in the Baseri pargana.

The Golapurahs claim to be Pátak Bráhmans; they would appear to have come about the middle of the thirteenth century from mouza Palli in Bhartpur.

The Játs first came to Dholpur with Rana Kirat Singh at the beginning of the present century.

Population.—A rough census of the population was taken during the survey of the State in 1876. The returns show: of males,—adults 101,539, minors under ten years 29,627; of females,—adults 67,540, and minors under ten years 29,270—total 227,976.

It may be guessed, however, that these numbers do not give the whole population, and that the census has not been accurately taken, especially of the women. Perhaps the population of the State may be reckoned at 250,000, or about 213 inhabitants to each square mile, and 622 to each cultivated square mile. Cases of infanticide sometimes occur, but there is no reason to believe that it is generally practised.

Castes and Tribes.—The most numerous classes are at two extremes of the social scale: Bráhmans 36,884, and Chamárs 32,092. Thákurs number 23,703, Gújars 17,229, Kachhis 15,090, Mainas 10,620, and Lodas 8,050. The remainder of the population is divided among 75 other ordinary castes. There are 9,964 Muhammadans who reside for the most part in the towns of Bári and Dholpur.

State of Society.—The people generally are engaged in tilling the land, and the whole country is agricultural, with no particular manufactures and no trading marts. In fact, the State territory in no way differs in character from any other district of the plains west of the Jumna. The inhabitants are of similar classes and occupations to those of the North-Western Provinces generally. Many of the chief Thákurs and landowners are improvident and in debt. In the time of the last Rana some of them rack-rented

their tenantry, who left the estates. Meanwhile the Government farmed out its land-revenue largely; and these proceedings, intensified by the drought of 1868-69, had for effect the depopulation of many villages, a contraction and deterioration of the cultivation, and impoverishment of the country generally.

Since the accession of the present chief, considerable improvements have been effected, and the regular land settlement will restore the cultivation and land-revenues to a better condition. The admixture in the population of criminal classes, properly so called, is small. The crimes of more ordinary occurrence are agrarian outrages arising from disputes regarding the possession of land, and cattle theft, which is yearly diminishing. Thefts and burglaries are not common, and the highroad from Agra to Gwalior, running for 20 miles through the centre of the State, is quite safe.

Occupations : Houses.—The following is a list of the principal trades :—

TRADE.	Number.	Town or locality where they principally reside.
Banyas (grain-sellers)	6,778	Bári, Dholpur, Rajakhera.
Kolis (weavers)	6,569	Bári, Dholpur, Rajakhera.
Julahas (do. Muhammadans)	91	Bári, Dholpur.
Kumbárs (potters)	2,376	Bári, Dholpur, Rajakhera.
Lohars (blacksmiths)	882	Bári, Dholpur.
Munihars (bangle-makers)	543	Bári, Kolari.
Sungtarash (stone-cutters)	442	Bári, Dholpur.
Kussab (butchers)	283	Bári, Dholpur.
Rungrez (dyers)	254	Dholpur.
Sikligars (knife-grinders and armour- ers)	145	Kolari.
Mochis (shoe-makers)	77	Bári, Dholpur, Sir Muttra.
Thatteras (braziers)	18	Dholpur.
Total	18,458	

Dholpur is not remarkable for any special manufacture. The work of the Bári blacksmiths is thought very good; but they get their iron from a distance, and are unable to compete with cheaper work in markets beyond the State. The number of houses in the State is 49,302, of which 9,834 are built of masonry; these are principally in the towns of Bári, Dholpur, and Sir Muttra.

Religion.—In religion, Hinduism of the Vaishnavite sect prevails: there are some few Jains at Rajakhera.

There are 308 temples dedicated to different forms of Vishnu, the preserver; 58 to Siva, the destroyer; 64 to Hanumán, the monkey-god; and 27 to other minor deities. Of this total of 467 temples, 222 are kept up by the State.

The tutelar deity of the family of the chief is Narsinghji, the man-lion, the fourth incarnation of Vishnu.

Education.—Only 2 per cent. of the Hindus and 5 per cent. of the Muhammadans can read and write; 554 persons read Persian and Urdu, 21 Arabic, 65 English, and 40,700 Hindí. There are eight schools maintained by the State in the larger towns, at an annual cost of Rs. 3,637. Of these, in one, English, Persian, and Hindí are taught; in four, Persian and Hindí; and in three, Hindí only. The number of scholars is 509. The number of schools and scholars is increasing year by year. A large number of children of the better classes read with private teachers at their own houses.

Jail.—*Police.*—The jail is four miles west of Dholpur. It contains an average of 140 prisoners sentenced to various terms of imprisonment, from one month to life; 60 prisoners are employed in extra-mural labour, the rest work on the roads.

The dieting of prisoners is on a scale similar to that in British jails.

The police and judicial administration is under the Názim or chief civil and criminal judge. There are 11 police stations and 44 outposts, with a watchman in each village. The entire police force consists of 45 officers of different grades, 39 sowars, 213 barkandazes, and 129 chaukidars, besides village chaukidars.

Tahsildárs have in their parganas judicial powers similar to those of a magistrate of the 3rd class in British districts.

The Názim is authorized to try all cases; but those involving a punishment heavier than three years' imprisonment, must be referred for confirmation to the Council of Management. He hears appeals from orders of subordinate judicial officers. Appeals from his orders are heard by the Council of Management, which has also the power of transferring any case for trial to the Court of the Council, or of taking up any in original jurisdiction.

Principal Towns.—The principal towns are three in number. Dholpur, the capital of the State, has 3,337 houses and 15,000 inhabitants.

The original town is supposed to have been built by Rájá Dholan Dev in the beginning of the eleventh century, to the south of the present site; which latter was probably selected by Prince Humayún about 1526, as farther removed from the encroachments of the Chambal.

An enclosed, and to some extent fortified, serai was built in the reign of Akbár; further additions were made during the same reign by Mansabdar Sadik Muhammad Khan; and finally Fatehabad was added by Nawab Fathullah Khán, Subáhdár of the Emperor Shahjahán.

The new portion of the town and the palaces of the Rana were built by Maharana Kirat Singh, the great-grandfather of the present chief of Dholpur.

Rajakhera, or the "village of the Rájá," is 24 miles from Dholpur itself and close to the north-east boundary of the State; it is said to have been built by Rájá Mán Singh Tonwár, during his occupation of the country towards the end of the fifteenth century. It is the head-quarters of a tahsil, with 1,194 houses and 7,460 inhabitants. A large mud fort was built near the town by Rájá Súraj Mal, Ját, in about 1765; it is still in a good state of preservation.

Bári is situated 22 miles to the south-west of Dholpur; it has 2,839 houses and 9,490 inhabitants.

Up to the middle of the fourteenth century, the tahsili was at Sewar, on the banks of the Chambal; about that time, however, some Kachhis, driven from their own village of Nidará, removed to this place, where they threw up a sort of entrenchment of stakes and mud near the hut of a Muhammadan faqir named Sayyid Ráj, who promised them his protection.

This collection of huts was called Bári, or "the staked enclosure." In course of time it grew into a town.

A strong masonry fort was built there in A.H. 848 (A.D. 1444) by Muazzam Khán, the governor, on the part of Sayyid Alá-ud-dín, then titular emperor at Delhi.

The tahsil was then removed to Bári, where it has since remained.

Communications.—The metalled road from Agra to Bombay runs through the breadth of the State from north to south, passing by Dholpur. It enters this territory 19 miles from Agra, at the Bángangá river, and passes out into Gwalior at the Chambál at the 37th milestone.

There are at present no other metalled highroads in the State.

The kutchra roads with the slightest pretension to being anything beyond village tracks, are:—

A road with a main direction to the north-east, from Dholpur to Rajakhera, and thence to Shamshabad and Agra;

A road with a main direction to the west from Dholpur to Bári, and thence to Bhartpur on one side and Kerauli on the other;

A road having a main direction to the north-east, from Dholpur to Kolari and Baseri, and thence to Kerauli.

The Sindia State Railway, now in course of construction between Agra and Gwalior, runs through the State, generally parallel to the grand trunk road, for a distance of 20 miles ; it will cross the Chambal over a bridge of 12 spans of 200 feet each, and about 112 feet above the river-bed.

Fairs and Holy-places.—A fair in honour of Narsinghji is held at Dholpur in the latter half of October ; it is attended by large numbers of people. Quantities of merchandise of different kinds, as well as cattle, horses, sheep and goats, are bought and sold during the fifteen days that this fair continues. Goods are brought from Delhi, Agra, Cawnpore, and Lucknow. Religious fairs for the purpose of bathing are held at Mach Kund, a lake three miles to the west of Dholpur, sacred to Sri Krishnji, in May, and again at the beginning of September.

The lake, which covers an area of 41 acres, lies in a natural hollow of great depth ; it is filled in the rains by the drainage of the surrounding country and maintained by the convergence of springs having their source in the sandstone hills by which it is surrounded.

The origin of Mach Kund is attributed by local tradition to the era of Sri Krishna. Rájá Mach Kund was a faithful servant of the gods, who, having lived a holy life, desired to find rest from earthly cares in death. Vishnu refused his request, but permitted him to seek temporary repose, for some centuries, in sleep ; and a decree went forth that anyone disturbing the holy Rájá should be consumed by fire.

Sri Krishna, flying from the Rákshas Kályámún, chanced to pass by the place where the Rájá slept. Without disturbing him, the god threw a cloth over the face of Mach Kund, and concealed himself close by.

Soon after arrived Kályámún, who, concluding that the sleeping man was the enemy he sought, rudely awoke him, and was instantly consumed by fire.

Sri Krishna remained with the Rájá for some days, but finding that no water was to be had nearer than the Chambal, he struck his foot on the ground and caused a depression in the living rock, which immediately filled with water and now forms the lake.

The piety of successive generations has erected 114 temples on its banks ; none are of an earlier date than the end of the fifteenth century.

A large fair is held on the “ Sheorattre ” festival, about the end of February, at the mandir dedicated to Mahádeo at Saepan, 14 miles north-west of Dholpur. This mandir is a large, fine building ; it was erected in 1846 by Maharana Bhagwant Singh, the grandfather of the present chief.

The other fairs and religious assemblages held at holy-places in Dholpur are unimportant.

Antiquities and Remarkable Places.—The oldest building in the State is the dargah and tomb at Bari of Sayyid Raj Bokhari, the faqir who has been already mentioned as having founded the town, and who is stated to have lived in the middle of the fifteenth century. There is nothing remarkable about the architecture of this building.

A mosque with a tomb, surrounded by a handsome perforated stone screen, or *pardah*, is situated outside the town of Dholpur to the south.

It is shown by a perfectly legible inscription to have been built in 944 Hijri (or A.D. 1537) over the remains of Mussummat Zurina, who died on the 14th day of the month of Shabán 922 A.H. (or 1516 A.D.): who she was, is not known.

The tomb of Shah Sarafabdal, a faqir who is stated to have come to Dholpur about the middle of the sixteenth century, during the interregnum when Sher Shah had usurped the crown of Humayún, is situated on a sandstone hill about a mile to the west of the town of Dholpur.

Shah Sarafabdal is stated to have lived on terms of amity with a Hindu ascetic, Munisidh, whose home was in a cave lower down on the same hill.

After the death of the Muhammadan saint, Munisidh disappeared; he is, however, said to be still alive, but concealed in the secret recesses of the cave.

A handsome mausoleum close to Akbár's sarai, to the north-east of the town of Dholpur, was erected by Abdul Rashid Khan to the memory of his father Sadik Muhammad Khan, one of Akbár's most distinguished generals who died at Dholpur in A.D. 1588.

The chronograph on the headstone gives the date of his death as A.H. 997; but the tomb was not built until A.H. 1006. In style and ornament it resembles roughly, though on a much smaller scale, the mausoleums of Akbár and of Ithmad-u-daulah in Agra.

A range of palaces was built about 1617 by Prince Shahjahán, as a shooting-lodge, on the bund of a lake at Kanpur, five miles to the south-east of the town of Bári.

They are now to a great extent in ruins, all the iron-work and a great deal of the carved stone having been carried off by the inhabitants of the adjacent villages.

The construction of the fine buildings must have cost from five to six lakhs of rupees. They are excellent specimens of the architecture of their epoch.

Crops ordinarily grown in the kharif and rabi.

Season in which grown.	Nature of crops.	Total area in acres taken up for the crop.	Parganas in which largest areas are taken up for the crop.	REMARKS.
Kharif or rain crop...	Bárá, mixed with tñl, úrid and other grains	69,000	Bári, Gird.	
	Mót	40,000	Bári.	
	Jowár, mixed with other grains ...	27,500	Rajakhera, Bari, Kolari.	
	Cotton	23,000	Bári, Rajakhera, Baseri.	
	Sugarcane	2,690	Bari, Baseri.	
	Rice	3,456	Sir Muttra (Bári).	
	Tobacco	532	Bári	The Dholpur tobacco is of good average quality.
	Other crops	21,004		
	Total kharif ...	187,182		
Rabi or cold-weather crop.	Gram	65,130	Bári, Rajakhera.	
	Wheat	24,240	Gird, Bári.	
	Barley mixed sarson, &c.	15,800	Gird, Rajakhera.	
	Barley, unmixed ...	13,700	Bári, Gird, Kolari.	
	Arhár	2,648	Kolari	Arhár is a precarious crop. Owing to the sandy nature of the soil, the roots are left dry, and the plant is more easily affected by frost.
	Poppy	420	Baseri, Sir Muttra.	A precarious crop; but, if successful, pays well. Zírá is cummin-seed, a spice commanding a ready sale.
	Zírá	606	Gird, Kolari ...	
	Other crops	665		
	Total rabi ...	123,209		
	Total area taken up of crops in both seasons	310,391		

Administrative Sub-Division, Land Revenue.

Name of Tahsil.	Geographical position in the State.	Taluqas,	Number of villages in each taluqa.	Total number of villages in the taluqas.	REMARKS.
Gird	...	1. Gird 2. Chaoni 3. Dang 4. Munnia 5. Mangrol	44 29 15 38 13		
Bári	...	1. Sir Muttra 2. Rijouni 3. Bári 4. Sikarra 5. Unreh 6. Dang 7. Bilouni	32 7 71 17 28 13 9	139	
Bári.	...	1. Baseri 2. Angai	26 24	177	
Kolari	...	1. Kolari 2. Bussai 3. Sepao	42 14 11	50	
Rajakhera	...	1. Rajakhera 2. Rehna	60 37	67	
		97	
		Total number of villages ...	...	530	

GAZETTEER OF DUNGARPUR.

General Topography.—Dungarpur is bounded on the north by Mewar, on the east by Mewar and the river Mahi, which separates it from the State of Bānswāra, on the south by the river Māhi, and on the west by Rewa and Mahi Kānta. Its area is about 952 square miles. It is situated between latitude $23^{\circ} 35'$ and $24^{\circ} 3'$, and longitude $73^{\circ} 40'$ and $74^{\circ} 18'$. Length east to west forty miles. Breadth north to south thirty-five miles.

The country is for the most part covered with stony hills, on which grows a low jungle of cacti, jujube trees, and a gum-producing tree called salar by the natives, together with several other varieties of shrubs and trees not requiring a deep soil or moisture. In the summer the jungles are generally leafless, but during and after the rains the luxuriant and varied vegetation, and the graceful outlines of the numerous hills, form scenes of great beauty. Towards Mewar and Partābgarh the landscape is wild and rugged; but in the direction of the Rewa Kānta border the harsher features are much softened, and for several square miles the country has much the character and appearance of Guzerāt. Here there are two or three large forest tracts on which grow blackwood, ebony, and several other valuable timber trees. Of pasture-land, properly so-called, there is scarcely any, and during the hot season of the year, the numerous cattle kept by the Bhils are reduced to a miserable state of leanness by the want of grass. With the exception of the patches of Walra* cultivation on the hillsides, the cultivated area is confined to the valleys and low grounds between hills, where the soil is of a rich alluvial nature, and can be irrigated from numerous wells and tanks. Though the country is broken and hilly, none of the hills are of any great size. Near the capital there is a hill about 700 feet high, and five miles in circumference at base, which overlooks the town, and with the Maharāwal's palace on its summit, and a lake at its foot, forms a striking picture. At Sagwara there is another hill, somewhat higher and larger than the one near the city.

* This is the local word for the practice of burning down the forest on a piece of land scattering seed in the ashes.

Geology and Minerals.—The country is very stony, and consists for the most part of decomposed trap, and, in the greater number of the valleys, of an alluvial deposit of loam, &c. Geologically the rocks are of the granitic and primitive or metamorphic order of formation, and their chief constituents are gneiss, hornblend, argillaceous schist, or clay slate, mica, calcareous sandstone, quartz, &c. The last of these ingredients appears in large quantities, either in veins or lying in detached particles on the surface of the ground. No traces of gold have been discovered: the strata are at every inclination to the horizon, evidently caused by volcanic agency. A good durable stone fit for building purposes of a granitic class is quarried from a hill near the village of Kakra Durra, about six miles south of the capital. A soft greenish-grey stone (serpentine) is found near the village of Matugamra, about six miles east of the capital. This is manufactured extensively at Dungarpur, and elsewhere; into idols, drinking-cups, effigies of men and women and animals. Another hard species of stone (basaltic), of which grinding-stones and such like articles are manufactured, is mined near the town of Sagwarra. Lime is found in tolerable abundance about the country, but it is not of a very pure description. No attempt ever appears to have been made to work an iron mine in the province; there is little doubt, however, that if this were done, it would meet with success, for the presence of this ore in the form of iron pyrites is sufficiently manifest in fragments of granitic rock and stone which lie pretty thickly in many parts of the country.

Rivers and Lakes.—The only rivers are the Mahi and Som, which meet near the sacred temple of Baneshar, where a large fair is held every year. The Mahi divides the State from Bānswāra, and the Som from the estate of Salumbar in Mewar. Both these streams are perennial, although in several places the water of the Som runs in a subterraneous channel, suddenly disappearing and emerging again, apparently little affected by its temporary subsidence. The bed of the Mahi is on an average about 300 or 400 feet in breadth, and is for the most part very stony. Its banks are in many parts steep, but never very high, and lined thickly in many places with *Vitex frifolia* (chaste tree), called by the natives Bena, which affords cover in the hot weather to tigers and other wild beast. The Som is a smaller river, but otherwise presents the same natural features as the Mahi.

There are no natural lakes in Dungarpur, but there are some five or six fair-sized artificial ones.

Climate and Rainfall.—The climate of Dungarpur is temperate and dry. The mean temperature is about 75° and the annual range about 25°. The average rainfall is about 24 inches. It

may be considered a healthy country, as cholera and other epidemics rarely show themselves, and excepting ague and fever of a mild type prevalent towards the end of the rains, and guinea-worm throughout the year, there are few noticeable diseases. The province is not, as a rule, subject to drought or floods. In 1868 and 1875, however, a great deal of damage was done to the crops by the heavy rains, and there is on record a partial drought in the year 1838, which caused much distress and misery among the lower classes.

History.—The Maharáwal of Dungarpur is of the Sesodia clan of Rájputís, and claims descent from an elder branch of the family which now rules at Udaipur. In Tod's *Rájásthán* it is said that the emigration of this branch from Mewar to Dungarpur took place at the end of the twelfth century, but that the manner in which the elder was supplanted by the younger brother at Chitur is unknown or uncertain. Sir John Malcolm's account is that not the elder brother himself, but one of his descendants, left Mewar about "three centuries ago," and having obtained possession of Gawalkot, then held by a Muhammadan, gradually overcame or drove back the Bhíl chiefs who held this country until he became master of the whole province called Bágar. This must have been not later than the fifteenth century; for Údai Singh, a Ráwal of Dungarpur, was certainly killed fighting under the standard of Raná Sanga, at the great battle of Kanwa against the Emperor Bábar in 1528 A.D. After his death his territory split up into two divisions, of which one went to his elder son, the ancestor of the Dungarpur chiefs, and the other to the younger son, from whom descend the Bánswára chiefs.

When the Mughal empire had been fairly consolidated, the Dungarpur chief opened communication with the court, and appears to have attended upon the emperor, to have offered allegiance, and to have received protection. His successors paid tribute and did military service; maintaining relations with the imperial governor in Guzerát. Upon the fall of the empire, Dungarpur, like other petty States similarly situated, became tributary to the Marathas; and it was arranged to divide the tribute of Rs. 35,000 at which it was assessed, among Sindia, Holkar, and the Dhár chief; but the chief of Dhár ultimately succeeded in establishing his exclusive right. After being wasted by Marathas the territory became a prey to Pindáris and freebooting companies; also to the bands of mercenary Arabs and Afghans which the chief himself had retained for his defence. They were at last driven off by a strong detachment of British troops; the British Government having taken the State under its protection by the Treaty of 1818. The tribute was transferred to the British Government.

Great disorders continued, however, to prevail for some years, as the Rájput chiefs were either unable to control the turbulent Bhíl tribes within their borders, or were in league with them for plunder and the annexation of lands. A force under British officers was therefore sent through the country ; which had very partial success, though the Bhíl chiefs were brought to terms, and the disorders gradually subsided. The Ráwal Jeswant Singh was incompetent as a ruler, and his private life was disorderly. He was accordingly deposed in 1825, and his adopted son Dalpat Singh, grandson of Sáwant Singh, chief of Partábgarh, was installed as Regent. In 1844 the succession to the rulership of Partábgarh devolved on Dalpat Singh, and he was permitted to adopt Údai Singh as his successor in Dungarpur, but while chief of Partábgarh, and during the boy's minority, to continue as Regent of Dungarpur. At this period Jeswant Singh made an unsuccessful attempt to recover his authority. He was consequently removed to Muttra, and kept under surveillance. But the arrangement by which Dalpat Singh was left in charge of Dungarpur, while he resided in Partábgarh, did not succeed ; and therefore, in 1852, he resigned all power in the former State, which was put under a native Agent till the present ruler Údai Singh attained his majority.

The chief of Dungarpur has been guaranteed the right of adoption, and receives a salute of 15 guns.

The language spoken in Dungarpur is a mixture of Guzerathi and Hindustani, and is called Bágar.

Form of Government and Administration.—The Maharáwal is the chief authority in the State. All criminal cases are settled in the city by a court of officials called kámdárs, presided over by the Maharáwal's minister ; and the Indian Penal Code, though not very rigorously adhered to, is their guide in the investigation and punishment of offences. In all cases appeal to the Maharáwal is permissible.

The divisions of the territory are now, as formerly, called "Tappah," and are similar to the parganas of other quarters, but they have no hereditary officers like the "kanúngos" of Malwa. In those in which the khálsa or crown villages are numerous, a petty officer of Government is stationed, but generally the communications between the minister of the State and the patels or headmen of the villages are direct, or maintained through the medium of the minister's deputies. In a country where there are so many feudal chiefs, one might be led to expect a multiplicity of petty districts, and to suppose that the lands of each noble would be comprised within a compact circle of territory, forming one of the smaller divisions of the province in which it is situated.

But in Dungarpur no such arrangement is found. The principal nobles have lands in separate districts, though the majority of their possessions may be confined to one. The country is divided into six great divisions which will be noticed hereafter. Patels of villages do not hold office hereditarily, and are liable to be displaced at the will of the chief. When a patel dies, his son is not considered as possessing any right to succeed to his office. On any occasion of vacancy, some one of the other inhabitants is generally nominated, and in his nomination regard is had both to the wealth and to the capacity of the individual. This officer is allowed $1\frac{1}{4}$ seers in every maund of grain delivered to the State, and in such villages as are not called upon for grain, he receives a small cash percentage which is nowhere defined. His duty is to arrange proportions of payment, to collect the money from the villagers, and to decide in trifling cases of dispute. No other judiciary powers are conferred on him; he has not even authority to punish the cultivators, and if the latter misbehave, he must refer their conduct to the chief.

When he cannot himself settle a petty dispute among the villagers, it is referred to a *punchayet*, or small council composed of the most respectable inhabitants of the place, from whose decision, however, the contending parties may appeal to the chief. Disputes between persons residing in separate villages are brought before the representatives of each. The nobles or Thákurs have the power of exacting fines in their own villages, but they cannot pass sentences of death, or even of corporal punishment, except on Bhíls detected in theft. They may settle differences, but in all cases the litigants have the right of appeal to the Maharáwal or chief, who is the paramount authority in the land. He alone has the power of awarding capital punishment. The Bhíls actually within the limits of Dungarpur are neither so numerous nor troublesome as those on the frontier, and are kept in subjection and order without difficulty.

As the position of the village patels have already been detailed it is necessary only to refer to the divisions of the territory.

There are six provinces :—

Bárah,	Chowrássi,
Barel,	Tirpod,
Kitarah,	Chusat,

in each of which are several villages, which may be divided into—

- (1) Khálsa or crown lands,
- (2) Jágírs, or those held by nobles,
- (3) Khairát, or religious grants.

The khálsa are those which belong exclusively to the State, and are under the superintendence of the minister, or any person

he may depute. Few have been granted in lease, not because of any prejudice or objection to that system, but because there are few persons in the country possessing the means to enter on such speculations.

The next class are held by the Rájpút Thákurs or nobles, and by others to whom lands have been given, either as favours or in reward for services.

In some of these villages or estates the Thákur receives the whole revenue and pays nothing to the State, while in others he pays a certain amount to the State. All the 'Thákurs' lands are held on these terms.

The right of the ruler to resume these possessions has always been asserted, though, as a matter of fact, no such resumption could be made except for rebellion or refusal of the customary dues or services.

Grants to the religious orders, shrines, or temples are usually perpetual. They are bestowed in the form of engraved plates of copper, bearing the formula that the possession shall not be alienated so long as the sun and moon endure.

The boundaries of the lands attached to the villages are well known, though not marked by artificial objects. They remain as they were established long ago, and are not only the boundaries of villages, but of districts also. Sometimes a tree, sometimes the bed of a stream, sometimes a particular field is the land-mark, but in all cases they are too well defined to occasion contention. Within the limits of the villages are comprised all the lands of the districts, except the higher and more inaccessible hills which are the haunts of the Bhíls.

The natural productions of the province are of the ordinary sort—wheat, barley, gram, millet, Indian-corn, rice, and a few inferior sorts of grain; also cotton, opium, oil-plants, ginger, chillies, turmeric, and sugarcane. Vegetables are grown considerably, and consist of onions, yams, sweet-potatoes, egg plants, and radishes. Fruit is not abundant, little else being seen but inferior melons, limes, mangoes, and plantains. Mohwa trees are very numerous, and from their fruit a strong fermented liquor is distilled.

Agriculture.—The greater portion of the land is irrigated by wells; some parts are supplied with water raised and conveyed by artificial channels from a river, or an excavation made in the bed of a river close to the bank.

A still smaller portion of ground receives water from tanks. The tract irrigated by water from wells is, however, far greater in extent than the united area of all the land watered from tanks or streams.

The fields are manured by means of a log of wood (yoked at both ends to bullocks), which spreads the manure over the ground. This is done immediately after the first heavy rain of the monsoon. The ground is then ploughed, and seed sown.

Weeding takes place a fortnight or so afterwards. Before sowing rice, the beds are banked up to retain the water, and after the young plants have attained a growth of about six inches, they are transplanted and kept in water about four inches deep, until they are two months old, after which the water is allowed to subside. On its subsidence, or in about a fortnight, the crop is cut. Wheat is usually grown unirrigated. The methods of cultivating opium and sugarcane do not differ from those of other districts, and are too well known to require notice here. If the latter is not thoroughly eradicated from the soil, it will renew itself four years consecutively. Turmeric, yams, ginger, and sweet-potatoes are sown in June, and propagated from tubers. They are irrigated three or four times and rooted up in October. Yams, when sprouting, are covered with layers of leaves to protect them from the sun.

Land Revenue and Tenures.—There appears to be no fixed rule for determining the amount of collection to be paid by each town or village in this territory. The land is not measured, nor rented at a fixed sum for each bigha, as is practised in some parts of Malwa: great irregularity exists, but the following have been detailed as the usual methods of adjusting the payments, which, though simple, are liable to many objections:—

At the spring and autumn harvests, a Government officer is detached, who, after inspection of the crops, settles with the patel the sum to be paid to the State. It is often made a matter of interest to the individuals so employed to rate the produce below its just value. Another method that now obtains, and which has for some years past prevailed, is also faulty, from a tendency which it must have to create suspicion and unjust oppression on the part of the Government, and anxiety and alarm on the part of the landed proprietors. Once a year the officers of Government call in the patels, and, having ascertained from them the sum each village is capable of yielding, fix the amount of the several heads of collection. In order to guard against false statements, and to deter the patel from underrating the produce of his village, he is not only threatened with the severest treatment, but made to enter into engagements by which he stipulates, in the event of being found guilty of imposition, to pay eleven rupees for every one in the deficiency between the sum stated and the actual value. The State holds the village headman responsible for the punctual payment of revenue, and in the event of a

cultivator failing to pay at the proper time, he becomes indebted to the headman, who can claim interest on the amount thus unadjusted till the claim be cleared. These headmen are in some places paid by a grant of land, in some by a portion of the revenue, and in others by a fixed annual sum of money. The evils that such a process must occasion are obvious. Formerly, a greater degree of regularity seems to have been prevalent.

In the time of Punjab Ráwal, who lived about 190 years ago, the lands were measured, the rates fixed, and the various heads into which the collections are divided, were established. The standard of payment thus fixed continued till the State fell into decay some years ago, and by it, in prosperous times, the Government could judge with tolerable accuracy of the value of all its possessions. It must, however, have ceased to be a guide when the country was laid waste and the inhabitants began to fly from their houses, at which period it may be conjectured the system of exaction had its rise.

The heads of collection established by Punjab Ráwal were 21 in number, the chief of which were "barrar" or ground-rent; various cesses for the payment of the salaries of Government officials; the chief's family; foreign mercenaries, and other miscellaneous imposts: all these assessments were not charged on every place, but they were all fixed sums. The system, as then established, although it has been subjected at various times to much modification, remains in vogue to the present day; but one important alteration has been made, and that is that the cultivator has now, in addition to the money payments, to yield a portion of his crop. From some villages a third of all the grain produced is taken, and from others a fourth, whilst the remaining charges are raised or lowered according to the quantity the cultivator is permitted to retain. Sometimes the proportion of grain claimed by the State is delivered in kind, and sometimes the cultivator pays its price in cash, according to the rates prevailing at the time. Every village is not subjected to this demand; but those that are exempt are cessed in a higher degree under other heads, whilst such places as are in an impoverished or desolate state pay the grain charge, but no other.

Some years ago, carefully, prepared statistics showed that the total land-revenues of Durgapur amounted to about Rs. 1,83,350, of which Rs. 79,688 went to the State, Rs. 91,967 to the Thákurs, and the balance to the religious orders.

The rayáts, who are mostly of the Kúrmí caste, cultivate the portions of ground tilled by their forefathers. These portions are called bantah. It contains two or three or more fields, and its extent is known by the number of ploughs employed on it: a

bantah of one plough will contain from 20 to 25 bighas. If a rayát dies without children, or flies from the country, the patel or headman of the village will provide for the cultivation of his ground in whatever way he may deem fit; but if he return, after long absence even, his piece of land will be restored. Still these bantahs are not altogether inalienable, for the ruler may deprive a cultivator of his land for misconduct, although it is considered a very severe punishment, and instances of its infliction rarely occur. No rayát has the power of selling his land, either in whole or part, but he may mortgage it, and the person to whom it is thus transferred becomes responsible for all charges to which it is liable. The Thákurs maintain at present a much smaller body of retainers than formerly, but the means to which recourse is had for their maintenance is the same. Small allotments of land are assigned to some, to others orders for money payments from the villages are given, and others receive food and a percentage on making collections for their masters.

Population and Social Sub-divisions.—The number of the entire Hindu population is estimated at 175,000. Three-fourths of the whole inhabitants are Hindus, one-eighth Jains, and one-eighth Musalmáns. The Bhíls aggregate some 10,000.

Dominant Classes.—As in the case of Mewar, there are said to be sixteen first-class nobles, and thirty-two of inferior rank, who compose the aristocracy of the State. The first-class Thákurs are entitled to “*tázim*,” namely, to be received standing by their chief. All the Thákurs are Rájputés who hold their land nominally by grant from the ruling chief, but really by right of kinship or alliance with his family; their united estates comprise lands containing some 170 villages.

In addition to performing active service when called upon by their liege-lord, they are bound to attend upon him during certain festivals, on the occasion of his receiving visits from, or paying visits to, other ruling chiefs, when a pilgrimage is undertaken, or when a marriage or other high ceremony takes place in the ruling family.

The following is a list of the first class nobles, and of their estates, number of villages, and amount of revenue :—

Clan of Rájputés.	Names.			Estates.	Number of villages.	Revenue in Salumsuri Rupees.
Chohán ...	Kesru Singh	...	...	Bankora ...	27 $\frac{3}{4}$	14,025
„ ...	Rattan Singh	...	...	Chitri ...	7	5,405
„ ...	Deep Singh	...	...	Peet ...	37	5,715

Clan of Rájput.	Names.			Estates.	Number of villages.	Revenue in Salumsuri Rupees.
Chohán ...	Údai Singh	...	...	Thákurda ...	12	6,444
„ ...	Dúngar Singh	...	...	Madone ...	14½	5,375
„ ...	Bhowan Singh	...	...	Bumasa ...	2	1,605
„ ...	Dhurat Singh	...	...	Bachíwara ...	6½	2,710
„ ...	Kesru Singh	...	...	Todawal ...	2½	1,450
Sesodia ..	Úméd Singh	...	...	Nandli ...	5½	1,632
„ ...	Gulab Singh	...	...	Sabli ...	3½	704
Rathor ...	Údai Singh	...	...	Kooa ..	35½	6,484
Sesodia— Chondáwat }	Partáb Singh	...	...	Ramghar ...	2	2,465
„ ...	Pahar Singh	...	...	Salaj ...	14	1,765
Solankhi, ...	Kúsal Singh	...	...	Mada ...	2	2,345

The nobles of the country are almost all, if not entirely, Rájput, and are fairly well off. The principal traders are the Hindu mahájans and the Bohras, who carry on a good business, considering the comparatively poor condition of the State. A number of Patháns and Mekránis reside in Dungarpur territory, some as money-lenders ; but most are employed as soldiers and armed attendants. Endeavours are being made to diminish their numbers. A list of most of the Hindu castes is given below as nearly as possible in order of precedence :—

Bráhmans.—Numbering between 8,000 and 10,000.

Rájput.

Sesodia,	Kachhwália,
Chohán,	Tonwár.
Jadou,	Bodana.

Ponwár, and a few others.

These classes do not intermarry.

Commercial Castes.

Oswál.	Nogdra.
Parewar.	Nursingpoora.

Bhuter.

Their number is about 5,000.

Of the Bhils, who are the aboriginal inhabitants of the country, there are many clans.

In the larger towns there will be found the usual petty tradesmen and craftsmen, such as makers of sweetmeats, workers in gold and silver, potters, smiths, vegetable-sellers, carpenters, stone-cutters, tanners, &c.: but in most of these villages and districts the occupations of the people are strictly agricultural; all their wants, which are few and simple, being supplied from the nearest towns and fairs.

Cloth and grain are the principal articles of barter. Regarding the manufactures and manufacturing classes in the State, there is little to note. Toys, drinking-vessels, and images made of a greenish-grey stone appear to be a speciality of Dungarpur. The men who fashion them are called sallats. Small bedsteads and stools made of teak-wood and fancifully coloured with lac are extensively manufactured at the capital by turners; and a class of metal workers known as Kussárs make brass and copper utensils, anklets, and other ornaments worn by Bhíl women, and curious brass chains, between the links of which are figures of animals, birds, &c.

No schools have been established in Dungarpur, nor is there any system of education.

Judicial System, Jails and Police.—As has already been stated, all civil cases and criminal cases, of any importance, are settled by a court presided over by the minister, from which, however, appeal is allowed to the Maharáwal.

The police arrangements of the capital are conducted by a kotwal or superintendent and 25 constables. In the districts there are six police centres, at each of which there is stationed an official called a thanadár, in charge of two sub-officials and a sufficient number of policemen. These thanadárs are of two classes: the first can sentence offenders to one month's imprisonment or exact 25 rupees fine, and the second can impose a fine of 10 rupees or eight days' confinement. In very trifling cases no record is kept, but otherwise the sanction of the city court is necessary. Cases of any importance are forwarded to the city court after the preliminary enquiry. The city jail is in charge of two officials and 25 policemen. The prisoners are supplied with warm clothing in the winter months by the State, and are granted an allowance of grain and two pie every day.

When sick, medicine is provided, and once in every 15 days they bathe, shave, and wash their clothes.

Communications, Towns and Remarkable Places.—There are no made roads in the State. A simple country cart-track runs from Bánswára through Dungarpur city to Khairwara, and

another from Bánswára to Khairwara *viâ* Sagwára. The direction of both is north-westerly. A third track passes in a south-west direction from Salumbar in Mewar through Dungarpur city to Bichawara on the south-western border of the State, where it joins the main road from Udaipur to Ahmedabad.

The principal towns are the capital Dungarpur, Galliako and Sagwára, each of the latter two with a population of about 3,000. Next in importance come Baroda, Nólsham, Ginj Bichawara, Aspur, and Bankora, which, however, may be more properly classed as large villages. Dungarpur, Galliakot, and Sagwára are the chief seats of trade, but in none of them is there a fixed market-day.

Two fairs are held during the year: the principal one at Baneshar in February or March, and the other at Galliakot, about the end of the latter month. The second is attended by few but Musalmáns, and is got up by the Bohras. All sorts and conditions of people to the number of 15,000 to 20,000 attend the former, which lasts about 15 days.

Merchants from the neighbouring countries also resort to this gathering. In 1873 the value of goods brought from all parts to this fair was estimated at about Rs. 1,48,000, of which Rs. 1,17,500 worth were sold.

There is a celebrated temple at Baneshar dedicated to Mahádevi, at which nearly all classes of the Hindu community assemble to worship. Baneshar is situated at the confluence of the Mahi and Som rivers, and the waters of these streams are there considered holy. There is a Muhammadan shrine called after Fakhar-ud-dín at Galliakot. The Bankuras have a temple dedicated to one of the incarnations of Vishnu, called Manji, near Baneshar. Near Dungarpur city is the special place of worship of the chiefs of Dungarpur.

